Coastal Ocean Dynamics Experiment CTD Data Report; 1979 to 1981

A. Y. P. Lee, D. J. Stucchi, and H. J. Freeland

Institute of Ocean Sciences
Department of Fisheries and Oceans
Sidney, B.C. V8L 4B2
Canada

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These reports provide a medium for the documentation and dissemination of data in a form directly useable by the scientific and engineering communities.

Generally, the reports will contain raw and/or analyzed data but will not contain interpretations of the data. Such compilations will commonly have been prepared in support of work related to the programs and interests of the Ocean Science and Surveys (OSS) sector of the Department of Fisheries and Oceans.

Data Reports are produced regionally but are numbered and indexed nationally. Requests for individual reports will be fulfilled by the issuing establishment listed on the front cover and title page. Out of stock reports will be supplied for a fee by commercial agents.

Regional and headquarters establishments of Ocean Science and Surveys ceased publication of their various report series as of December 1981. A complete listing of these publications and the last number issued under each title are published in the *Canadian Journal of Fisheries and Aquatic Sciences*, Volume 38: Index to Publications 1981. The current series began with Report Number 1 in January 1982.

Rapport statistique canadien sur l'hydrographie et les sciences océaniques

Ces rapports servent de véhicule pour la compilation et la diffusion des données sous une forme directement utilisable par les scientifiques et les techniciens.

En général, les rapports contiennent des données brutes ou analysées mais ne fournissent pas d'interprétations des données. Ces compilations sont préparées le plus souvent à l'appui de travaux reliés aux programmes et intérêts du service des Sciences et Levés océaniques (SLO) du ministère des Pêches et des Océans.

Les rapports statistiques sont produits à l'échelon régional mais sont numérotés et placés dans l'index à l'échelon national. Les demandes de rapports seront satisfaites par l'établissement auteur dont le nom figure sur la couverture et la page de titre. Les rapports épuisés seront fournis contre rétribution par des agents commerciaux.

Les établissements des Sciences et Levés océaniques dans les régions et à l'administration centrale ont cessé de publier leurs diverses séries de rapports depuis décembre 1981. Vous trouverez dans l'index des publications du volume 38 du *Journal canadien des sciences halieutiques et aquatiques*, la liste de ces publications ainsi que le dernier numéro paru dans chaque catégorie. La nouvelle série a commencé avec la publication du Rapport n° 1 en janvier 1982.

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Institute of Ocean Sciences
Department of Fisheries and Oceans
Sidney, B.C. V8L 4B2
Canada

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CONTENTS

	Page
Abstract/Resume	iv
Acknowledgments	v
Introduction	1
Sampling Program	1
Instrumentation	1
Data Processing	3
Data Quality	6
Dissolved Oxygen Content Data	10
References	10
Appendix 1. Index to calibrated data files	13
Data Listings 1979	27
Data Listings 1980	141
Data Listings 1981	269

ABSTRACT

Lee, A.Y.P., D.J. Stucchi and H.J. Freeland, 1984. Coastal Ocean Dynamics Experiment CTD Data Report: 1979 to 1981. Can. Data Rep. Hydrogr. Ocean Sci: 26:330p.

From January, 1979 to September 1981, as part of the Coastal Ocean Dynamics Experiment, the Coastal Zone Oceanography Group of the Institute of Ocean Sciences conducted 21 cruises off the southwest coast of Vancouver Island during which a total of 562 CTD (conductivity, temperature and depth) casts were obtained. This report describes the sampling program, the instrumentation used to collect the data, data processing procedures, and data quality. An index to the calibrated data files is also provided. The bulk of the report contains the listings of the CTD data and dissolved oxygen data at standard depths.

Key words: Salinity Profiles, temperature profiles, west coast Vancouver Island.

RESUMÉ

Lee, A.Y.P., D.J. Stucchi and H.J. Freeland, 1984. Coastal Ocean Dynamics Experiment CTD Data Report: 1979 to 1981. Can. Data Rep. Hydrogr. Ocean Sci: 26:330p.

Au cours de 21 expéditions effectuées au large de la côte sud-ouest de l'Île Vancouver, dans le cadre de l'expérience sur la dynamique océanique côtière, le Groupe d'étude de l'océanographie côtière de l'Institut des Sciences océaniques a réalisé 562 mouillages CTP (conductivité, température et profondeur). Le présent rapport traite du programme d'échantillonnage, des instruments utilisés pour la cueillette des données ainsi que des méthodes de traitement et de la qualité des données. Un index des fichiers de données calibrées est aussi présenté. La plus grande partie du rapport contient les listages des données CTP et des données sur l'oxygène dissous à des profondeurs normalisées.

Les mot clés: Profils de salinité, Profils de température, côte sud-ouest de l'Île Vancouver.

ACKNOWLEDGEMENTS

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INTRODUCTION

In January 1979, the Coastal Zone Oceanography Group at the Institute of Ocean Sciences (IOS) embarked on a physical oceanographic study of the continental shelf region off southern Vancouver Island. This was one component of the larger Coastal Ocean Dynamics Experiment, CODE, which involved a number of other groups from the Institute. Part of the CODE observational program entailed obtaining vertical profiles of temperature and salinity using a CTD (conductivity, temperature and depth) probe. Hydrocasts were also conducted to obtain seawater samples for dissolved oxygen content determinations. Reported here are the CTD data at standard depths and the dissolved oxygen content data collected during CODE by the personnel of the Coastal Zone Oceanography (CZO) Group. Also included in the report are a data index, description of the sampling program, instrumentation and data processing methods, and a discussion of data quality.

SAMPLING PROGRAM

The synoptic program of CTD and dissolved oxygen content measurements was started in January 1979 and was terminated in September 1982. During this period, the personnel of the CZO Group carried out a total of 21 cruises in the CODE area. The number of stations sampled during each cruise varied over the life of the study, but some stations were routinely sampled; such as Line 1, stations 101 to 111. Vertical profiles of temperature and conductivity were obtained routinely at all stations, but seawater samples for dissolved oxygen content determinations were obtained only at selected stations. The positions of most of the stations sampled during CODE are shown in Figure 1, and details of the specific station sampled during each cruise, time, date, position, depth and number of dissolved oxygen samples obtained are indexed in Appendix 1. Code CTD data collected by the Offshore Oceanography Group have been published by Thomson et al (1984), and Hill et al (1982a, 1982b, 1983) have published data collected by the Ocean Ecology Division.

INSTRUMENTATION

The instrumentation used to collect the data consisted of 1) a Guildline Instruments Ltd. model 8700 MK II CTD (conductivity, temperature and depth) probe and control console, 2) a programmable data acquisition system - PRODAS - built by McDonald-Detwiller Ltd., 3) a Hewlett-Packard XY_1Y_2 plotter and, 4) a winch with seven-conductor cable and slip ring assembly.

The method of operation is straightforward. The CTD probe is lowered and raised through the water column at the rate of 1 to 1.5m s^{-1}. Power for the probe is sent down the cable from the control console. The analogue data signals are sent up the cable (one conductor for each sensor plus a signal ground) through the slip ring assembly to the CTD deck unit and data acquisition system. In the CTD deck unit the temperature, conductivity and pressure signals are put through an analogue computer to calculate salinity and then fed to the XY_1Y_2 plotter for a real time plot of the temperature and salinity profile.

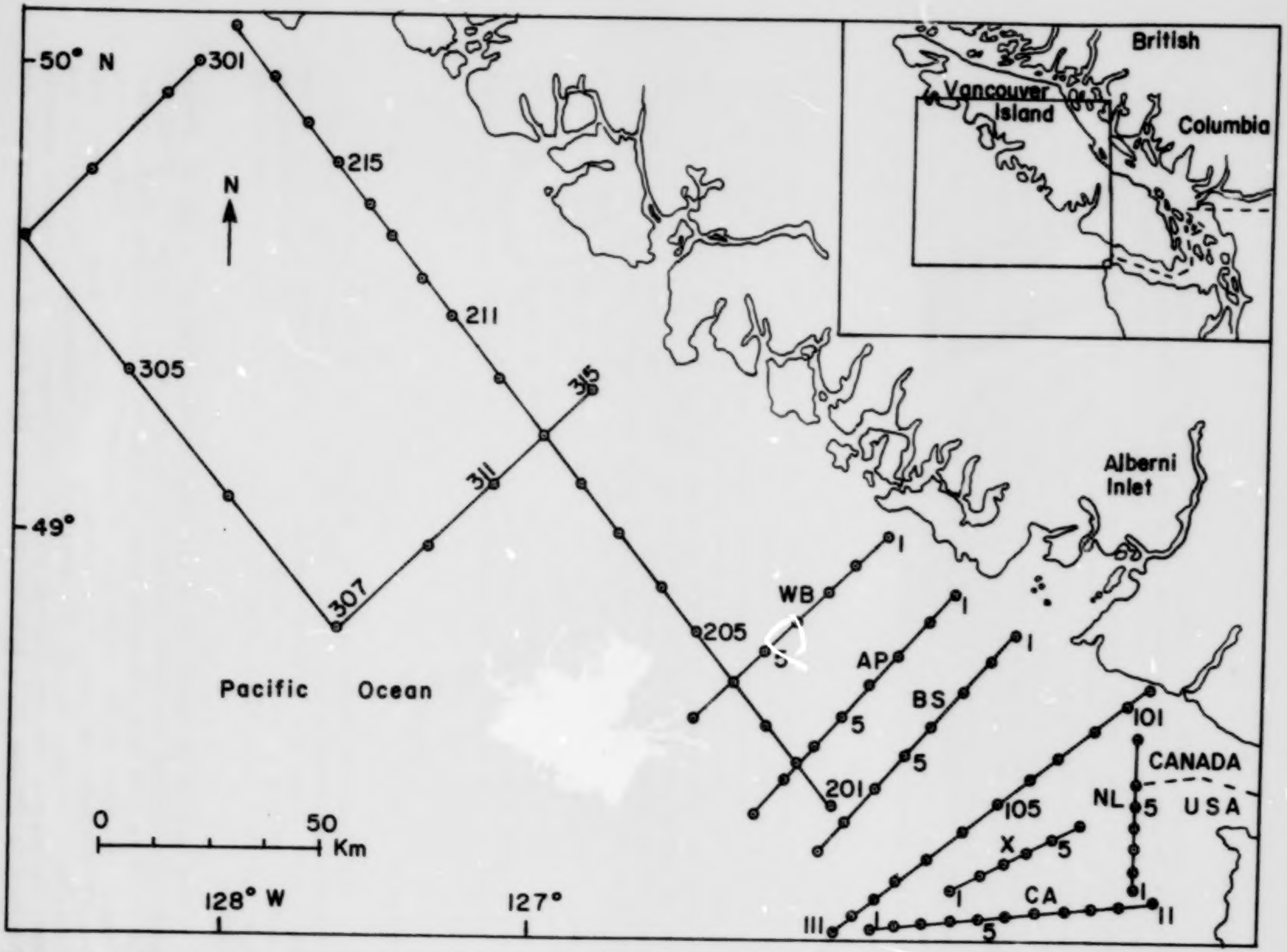
50° N
49°
128° W
127°
N
0
50
Km
Pacific Ocean
British
Columbia
Vancouver
Island
Alberni
Inlet
CANADA
USA
301
305
307
311
315
215
211
205
201
101
105
111
WB
AP
BS
NL
X
CA
1
5
11

Figure 1. Map showing location of stations sampled during CODE.

The data acquisition system accepts the probe signals directly then multiplexes (1.2 ms/6 channel scan), digitizes (16 bit A-D converter), and sums for an integral number (usually 15) of 60 Hz power supply cycles - this corresponds to a 0.25 second summation. The number of summations, the summation for each sensor and those for the zero and reference voltages are then stored in a buffer, along with header information, and subsequently written onto nine-track (800 BPI) tape. A thermal printer is used to display, in real time, a small portion of this data and any error messages relating to the operation of the data acquisition system. The operation of the data acquisition system relies on a micro-processor which has been programmed to co-ordinate and perform input-output function, summation and diagnostic checks.

For the most part CZO Group's CTD system was used, however there were a number of occasions when CZO's CTD system failed and data was obtained by manually digitizing the XY_1Y_2 plots, or when other CTD probes and systems were used. These departures from the norm and other relevant comments about the data are noted in the comments column of Table 1.

DATA PROCESSING

The processing of the data collected with the CTD system was carried out on the Univac 1106 computer at the Institute of Ocean Sciences. The processing is divided into four stages: 1) the conversion of the raw datalogger data, preliminary correction and calibration, and calculation of histograms, 2) manual editing of data, 3) final calibrations and calculations, and 4) data presentation. The data processing scheme is depicted in Figure 2.

The first stage of the processing begins with the conversion of the data written by PRODAS to Univac word format. The data are next converted to voltage units, the reference voltages checked for drift and then preliminary calibration applied to convert voltage to physical units, of temperature, conductivity and pressure. Because the temperature sensor has a slower response time than the conductivity sensor, the temperature data is corrected for this time response mismatch between the sensors. (This time response correction to the temperature data was only applied when the slow response - 0.25s - thermometer was fitted on the CTD.) The pressure data are checked to ensure that not only do they monotonically increase with time but also that the CTD probe is descending through the water column at a minimum speed of $0.5\ m\ s^{-1}$. The data are rejected when the above criteria are not satisfied. The reasons for rejection of these data will be discussed in the next section. Next, salinity is calculated according to the IAPSO "Practical Salinity Scale" (UNESCO, 1981a). No units are used for salinity. The numbers given are salinity x 10^3. The corrected data with brief headers are written to mass storage files. Finally first difference histograms of pressure, temperature and salinity are computed and listed out together with data records which have abnormally large first differences.

The second stage is the editing of the mass storage files. The histograms and editing information produced in stage one are used to determine what editing is to be done. Editing is performed manually and

CRUISE #	VESSEL	DATE YR/MO/DY	TIME RESPONSE CORRECTION	DESCENT RATE CUT-OFF	COMMENTS
1	CFAV ENDEAVOUR	79/01'30	YES	YES	12 HRS TIME SERIES AT STATION 106
2	PANDORA II	79/03/08	N/A	N/A	DIGITIZED XYY PLOTS-DATA QUALITY POOR
3	CSS VECTOR	79/04/19	YES	YES	DATALOGGER (PRODAS) FAILURE
4	CSS PARIZEAU	79/05/18	YES	YES	
5	PANDORA II	79/06/21	YES	YES	12 HRS TIME SERIES AT STATION 107
7	CSS PARIZEAU	79/10/12	YES	YES	
8	CSS PARIZEAU	79/11/27	YES	YES	OFFSHORE'S CTD AND WINCH USED FOR W.C. STATIONS
9	CSS PARIZEAU	80/02/07	YES	YES	OFFSHORE'S CTD AND WINCH USED FOR W.C. STATIONS
10	PANDORA II	80/03/25	YES	YES	
11	CSS PARIZEAU	80/04/22	YES	YES	
12	CSS PARIZEAU	80/06/11	NO	YES	OFFSHORE'S CTD PROBE (#40447) +PRODAS
13	CSS VECTOR	80/08/13	NO	YES	DATA QUALITY POOR -SLIP RING NOISE
14	CSS PARIZEAU	80/09/22	NO	YES	NEW TEMP AND COND SENSORS INSTALLED
15	CSS VECTOR	80/10/22	NO	YES	
16	CSS VECTOR	80/11/27	NO	YES	
17	CSS VECTOR	81/01/06	NO	YES	POOR WEATHER AND SEA CONDITIONS
18	CSS PARIZEAU	81/02/04	NO	YES	
19	CSS VECTOR	81/03/10	NO	YES	
20	CSS PARIZEAU	81/04/21	NO	YES	
21	CSS PARIZEAU	81/06/02	NO	YES	
22	CSS PARIZEAU	81/09/05	NO	YES	OFFSHORE'S CTD SYSTEM USED

TABLE 1.

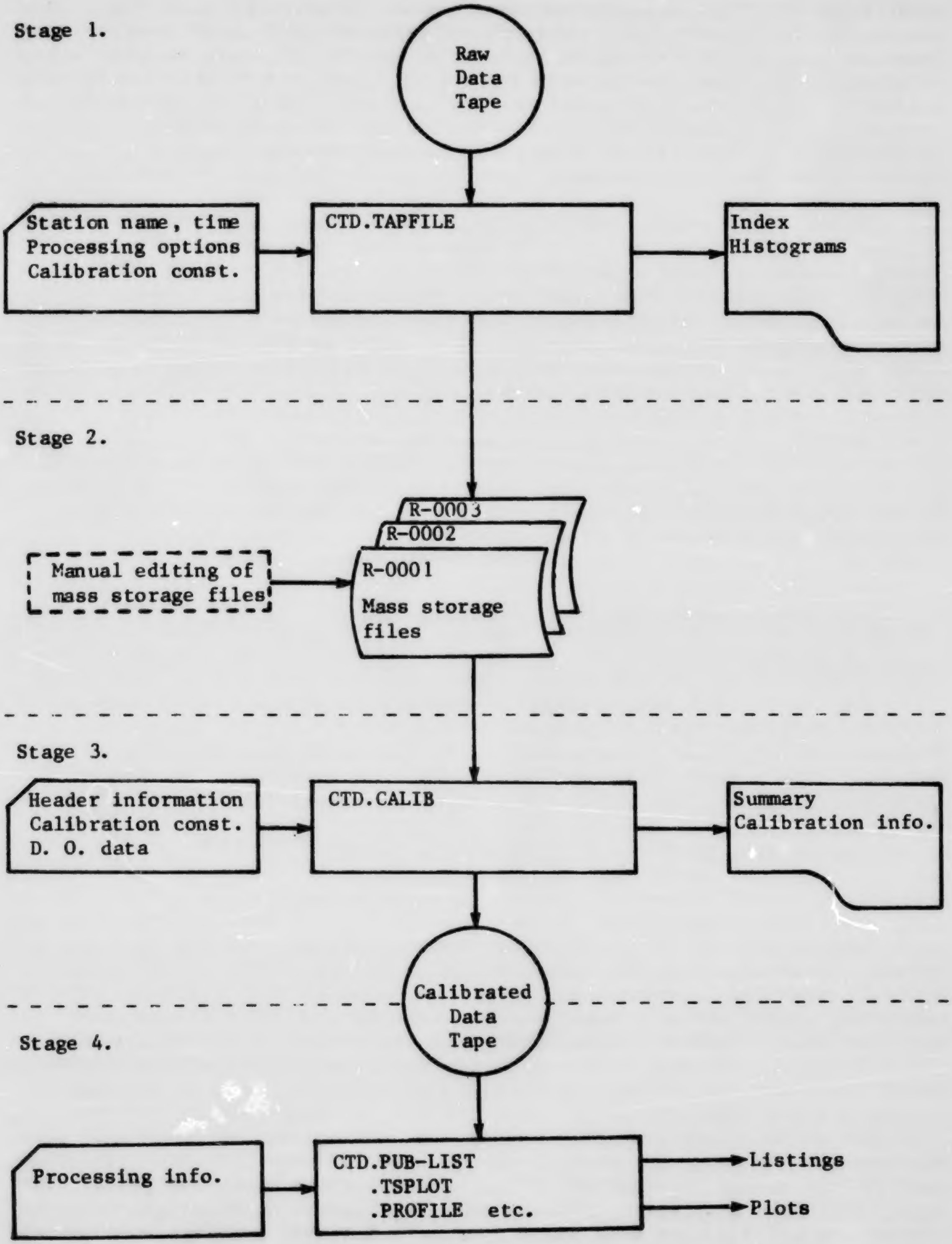
Stage 1.
Raw Data Tape
Station name, time
Processing options
Calibration const.
CTD.TAPFILE
Index
Histograms
Stage 2.
R-0003
R-0002
R-0001
Mass storage files
Manual editing of mass storage files
Stage 3.
Header information
Calibration const.
D. O. data
CTD.CALIB
Summary
Calibration info.
Calibrated Data Tape
Stage 4.
Processing info.
CTD.PUB-LIST
.TSPLOT
.PROFILE etc.
Listings
Plots

Figure 2. Data processing flow chart.

usually entails the deletion of data spikes or errors, i.e. data that exceeds predetermined first difference criteria for each sensor. The determination of the editing criteria will vary as the oceanographic state being sampled changes, but as with any editing scheme there will always be a subjective component and some data errors will pass uncorrected. Our experience with these CTD data has shown that the amount of editing performed on each file is small (0 to 5 data errors/profile) with the errors usually located in the top 20 metres of the profile.

In the third stage, the final calibrations are applied, and sigma-t (sigma-t = [ρ (S,T,0)-1000 kg m^{-3}]) and depth are computed. Sigma-t is computed using the new equation of state for seawater introduced by the UNESCO/ICES/SCOR/IAPSO joint panel on oceanographic standards (UNESCO 1981b). Depth is computed from pressure by the numerical integration of the hydrostatic pressure equation. All data is averaged over a one metre depth interval. The calibrated data is then written (unformatted) to nine track, 1600 BPI tape along with a header, which contains all the pertinent information about the particular CTD profile. The header includes: station name, position, time, date, pass number, cruise number, processing options, calibration constants, description of instrumentation, a comment field and any dissolved oxygen content data obtained at the station. Most of this header information is input in this third processing stage. One record of calibrated data is depicted below.

Depth (m)	Pressure (db)	Salinity	Temperature (°C)	Sigma-t (kg m^{-3})	Conductivity Ratio

The fourth and final stage of processing consists of a number of different programs which are used to present and display the data. Computer programs are available to produce profile plots, temperature-salinity (TS) diagrams, displacement plots, and various listing programs. The publication listing program was used to produce the standard depth listings contained in this report.

DATA QUALITY

Calibrations in the laboratory were performed on the temperature sensor. These consisted of either ice point determinations or calibrations over a range of temperatures using the Frozen Sea Research Group's temperature bath and 3 National Research Council (NRC) thermistors as standards or Offshore Oceanography Group's temperature bath. Checks on the conductivity circuit were performed by replacing the conductivity cell with a decade resistance box and running through the resistance range of interest.

The field checks of the temperature and conductivity sensors were obtained by placing a Niskin water sampling bottle with reversing thermometers on the 7 conductor cable, several metres above the probe. The probe and bottle were then positioned at a depth where vertical gradients in temperature and salinity were small. After a suitable stabilization period the bottle and thermometers were tripped, and simultaneously, the data from the data acquisition system were noted. Salinities determined from the bottle sample, and temperatures from reversing thermometers were then compared with those computed from the CTD data. Differences were calculated between the Guildline CTD data and in situ bottle data. The mean salinity difference or offset was then incorporated as a correction to the salinity in the third data processing stage. The mean temperature difference or offset was not used to correct the data because of the relatively large uncertainty in the reversing thermometer temperature (±0.02°C) and the large scatter in these differences (see Figure 3). The reversing thermometer data were used as an indicator for gross calibration shifts in the CTD temperature sensor. The statistics for the 2 years of in situ calibration data (153 samples) for different CTD probes and different temperature sensors indicate a mean temperature difference (CTD temperature-reversing thermometer reading) of -0.010°C with a sample standard deviation of 0.045°C - four and one half times as large as the mean. The 95% confidence interval for the mean is -0.017 to +0.003°C. The plot of temperature differences versus depth in Figure 3 indicates that there may be a bias with depth, however the large scatter in these data makes a depth dependent correction unwarranted. The statistics for the salinity differences (corrected CTD salinity - in situ bottle salinity) for different CTD probes and different conductivity sensors (169 samples) show no mean offset because the salinity data for each cruise have been corrected for the mean offset observed for that cruise (Figure 4). The mean salinity offsets for each cruise were in the range of 0.006 to 0.092. The sample standard deviation of 0.013 indicates that the scatter of the salinity differences about the offsets is small. The plot of salinity differences versus depth in Figure 4 also indicates a possible bias with depth, however even if the depth dependence of the salinity difference is significant the correction would be small (~0.006 at 500m). The temperature and salinity differences plotted in Figures 3 and 4 are not exclusively from samples taken at the CODE stations, also included are the calibration samples from Alberni Inlet, Nootka Sound Inlets and Knight Inlet.

An important aspect of CTD data quality is related to the variable descent rate of the CTD probe caused by ship motion. It has been observed that when the CTD probe slows down or reverses its descent spikes or loops appear in the salinity data - spikes as large as 0.15 have been observed in regions where vertical gradients are large. This spiking problem may be a sensor time response mismatch problem as the time response of the conductivity sensor depends strongly on the descent rate of the probe (Perkin and Lewis 1982). Since we did not know how to correct the conductivity data we rejected the CTD data whenever the probe descent rate was less than 0.5m s^{-1}. The descent rate cut-off criterion, though arbitrarily chosen, reduced the occurrence of this spiking problem, but not all the salinity spikes in the thermocline were eliminated. Salinity spikes which gave rise to density inversions greater than 0.02 kg m^{-3} over a one metre interval were corrected by linear interpolation.

Another problem area of the CTD data is in the near surface region (0 to 5m) where unrealistically large density inversions sometimes occur. These inversions may result from problems with the CTD and/or the manner in which profiles were taken from the vessels. It has been noted that if the conductivity cell is not properly cleaned and soaked prior to each cast large conductivity readings may occur at the start of the cast. Furthermore, during the cruises with the C.S.S Parizeau and C.S.S. Vector the profiles were obtained from the stern directly in the propeller wash from these

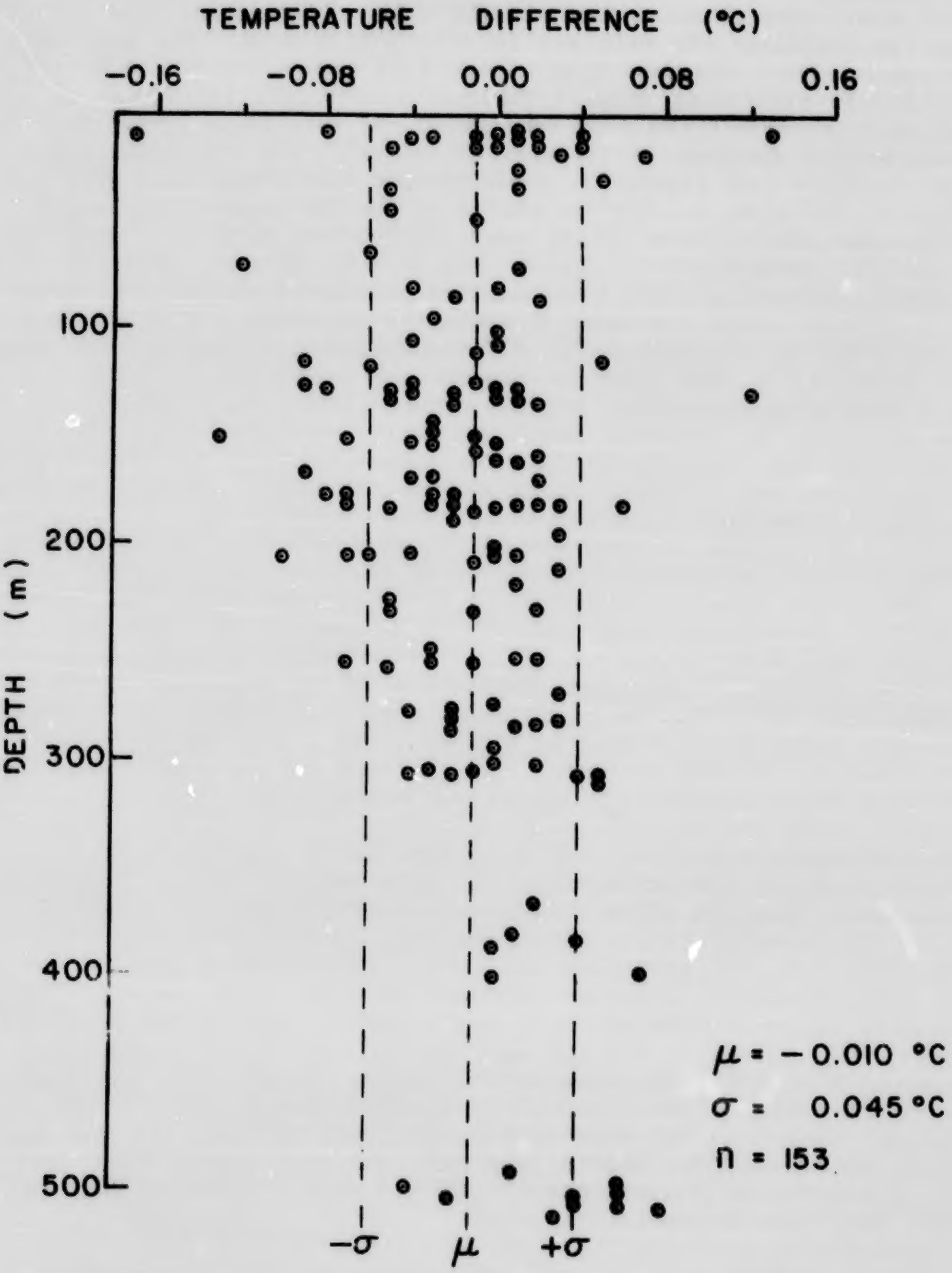

Figure 3 Temperature differences (Guildline CTD - reversing thermometers) for the period January 1979 to September 1981.

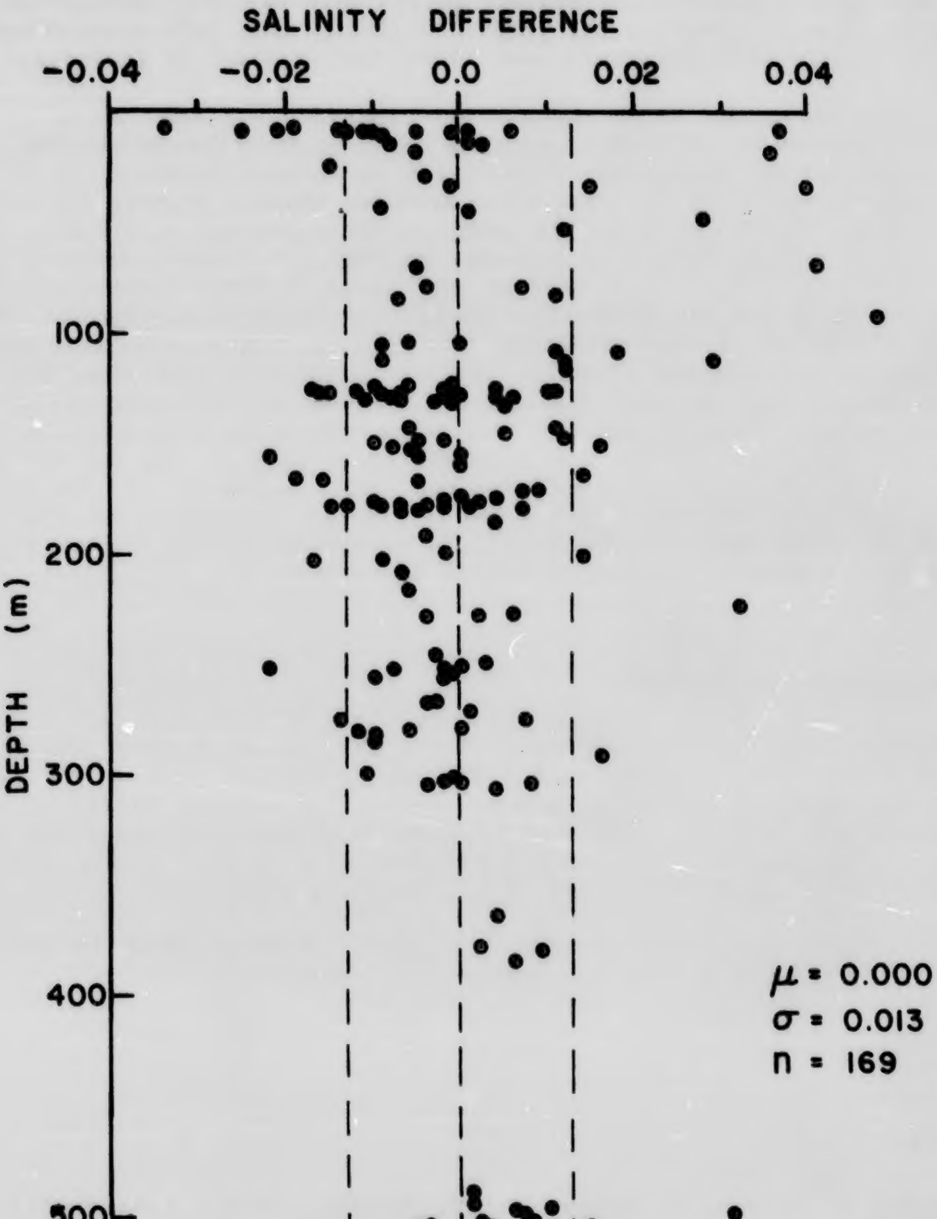

Figure 4 Salinity differences (corrected Guildline salinity - in situ bottle salinity) for the period from January 1979 to September 1981.

vessels. The constant stirring of the stratified surface waters by the propellers and the presence of bubbles in the wash may also have contributed to the spurious readings. Where possible these large inversions have been edited out, otherwise a comment describing the problem is included in the header.

The statement of data accuracy is necessarily ambiguous. The manufacturer states accuracies of ±0.01 for equivalent salinity, ±0.01°C for temperature and ±1.25 db for pressure. From the static, in situ calibrations the accuracy of the salinity is only slightly poorer at ±0.013. It is difficult to comment upon the accuracy of the temperature data using the static, in situ calibrations because the large standard deviation of the temperature differences. This large scatter is probably due to the limited accuracy (~0.02°C) of the reversing thermometers. When the CTD probe is descending through regions of large vertical gradients, and especially when the descent rate is varying due to ship motion the accuracy of the data deteriorates considerably, and the accuracies stated by the manufacturer are optimistic. Data quality has been observed to be poor in the top few metres of a number of profiles, but in the vast majority of profiles no abnormalities are present. Consequently it is difficult to assign an accuracy to these measurements given the transient nature of the problem. The problem of dynamic calibration of the temperature and conductivity sensor still remains.

DISSOLVED OXYGEN CONTENT DATA

Samples for dissolved oxygen content determination were obtained at standard depths using Niskin water sampling bottles. Samples were drawn, pickled and analyzed within 24 hours. A modified Winkler titration method (Strickland and Parsons 1965) was used to determine the dissolved oxygen content of the samples. Two titrations were done on each sample giving an accuracy of about ±0.02 ml/l under ideal laboratory conditions.

The dissolved oxygen content (in units of ml/l) data is presented together with the CTD data at the appropriate depths.

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Appendix 1. Index to calibrated data files on tape U00454, label: CSTL* CODE.

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
CRUISE # 01							
1	101	79/01/30	2224	48 39.00	125 2.50	54.5	0
2	102	79/01/30	2301	48 35.60	125 9.00	103.3	0
3	103	79/01/30	2342	48 32.20	125 15.50	103.1	0
4	104	79/01/31	0032	48 28.90	125 21.80	137.9	0
5	105	79/01/31	0119	48 25.50	125 28.30	122.0	0
6	106	79/01/31	0151	48 22.00	125 34.70	125.2	0
7	107	79/01/31	0236	48 18.60	125 41.20	138.1	0
8	108	79/01/31	0320	48 15.10	125 47.70	172.9	0
9	109	79/01/31	0359	48 12.90	125 52.00	394.0	0
10	110	79/01/31	0452	48 10.60	125 56.20	534.7	0
11	111	79/01/31	0533	48 8.50	126 .00	550.3	0
12	108	79/01/31	0648	48 15.10	125 47.70	185.7	0
13	201	79/01/31	0803	48 25.00	125 59.80	177.8	0
14	202	79/01/31	0902	48 31.50	126 7.00	178.9	0
15	203	79/01/31	1004	48 35.80	126 12.70	496.0	0
16	204	79/01/31	1103	48 41.40	126 19.10	421.7	0
17	205	79/01/31	1204	48 48.00	126 26.00	261.3	0
18	206	79/01/31	1303	48 54.00	126 33.00	249.1	0
19	207	79/01/31	1402	49 1.30	126 41.80	199.4	0
20	208	79/01/31	1503	49 7.30	126 48.90	153.5	0
21	209	79/01/31	1601	49 13.70	126 57.10	150.9	0
22	210	79/01/31	1701	49 21.53	127 5.60	143.1	0
23	211	79/01/31	1759	49 28.37	127 13.72	156.8	0
24	212	79/01/31	1901	49 33.64	127 20.38	225.2	0
25	213	79/01/31	2002	49 38.80	127 27.00	401.9	0
26	214	79/01/31	2102	49 42.70	127 32.10	490.7	0
27	215	79/01/31	2205	49 47.60	127 36.90	134.1	0
28	216	79/01/31	2313	49 53.20	127 41.40	258.2	0
29	217	79/02/01	0005	49 59.10	127 48.40	502.8	0
30	218	79/02/01	0121	50 5.20	127 56.90	85.4	0
31	301	79/02/01	0216	50 1.00	128 6.00	501.7	0
32	302	79/02/01	0324	49 56.50	128 12.00	503.0	0
33	303	79/02/01	0501	49 47.00	128 28.00	546.2	0
34	304	79/02/01	0627	49 38.00	128 40.00	541.4	0
35	305	79/02/01	0844	49 21.00	128 19.00	539.7	0
36	306	79/02/01	1100	49 5.00	127 58.00	542.3	0
37	307	79/02/01	1258	48 48.00	127 37.00	522.7	0
38	309	79/02/01	1453	48 58.00	127 20.00	513.5	0
39	311	79/02/01	1620	49 6.00	127 8.00	550.4	0
40	313	79/02/01	1744	49 14.00	126 55.00	163.7	0
41	315	79/02/01	1841	49 20.00	126 46.00	105.9	0
42	106	79/02/03	0405	48 22.00	125 34.70	138.7	0
43	106	79/02/03	0430	48 22.00	125 34.70	135.1	0
44	106	79/02/03	0501	48 22.00	125 34.70	134.8	0
45	106	79/02/03	0531	48 22.00	125 34.70	132.2	0
46	106	79/02/03	0601	48 22.00	125 34.70	135.9	0
47	106	79/02/03	0631	48 22.00	125 34.70	131.2	0
48	106	79/02/03	0701	48 22.00	125 34.70	124.0	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
49	106	79/02/03	0731	48 22.00	125 34.70	145.1	0
50	106	79/02/03	0804	48 22.00	125 34.70	133.0	0
51	106	79/02/03	0830	48 22.00	125 34.70	134.1	0
52	106	79/02/03	0901	48 22.00	125 34.70	134.7	0
53	106	79/02/03	0934	48 22.00	125 34.70	134.1	0
54	106	79/02/03	1005	48 22.00	125 34.70	137.2	0
55	106	79/02/03	1029	48 22.00	125 34.70	134.0	0
56	106	79/02/03	1059	48 22.00	125 34.70	132.1	0
57	106	79/02/03	1131	48 22.00	125 34.70	129.7	0
58	106	79/02/03	1202	48 22.00	125 34.70	137.1	0
59	106	79/02/03	1229	48 22.00	125 34.70	138.1	0
60	106	79/02/03	1250	48 22.00	125 34.70	136.9	0
61	106	79/02/03	1328	48 22.00	125 34.70	138.9	0
62	106	79/02/03	1400	48 22.00	125 34.70	137.8	0
63	106	79/02/03	1430	48 22.00	125 34.70	138.0	0
64	106	79/02/03	1501	48 22.00	125 34.70	138.7	0
65	106	79/02/03	1532	48 22.00	125 34.70	136.9	0
66	106	79/02/03	1605	48 22.00	125 34.70	123.0	0
67	106	79/02/03	1630	48 22.00	125 34.70	127.0	0
68	111	79/02/03	1834	48 8.50	126 .00	532.3	0
69	110	79/02/03	1947	48 10.60	125 56.20	555.9	10
70	109	79/02/03	2033	48 12.90	125 52.00	522.5	9
71	108	79/02/03	2145	48 15.10	125 47.70	280.0	0
72	107	79/02/03	2225	48 18.60	125 41.20	140.0	5
73	106	79/02/03	2317	48 22.00	125 34.70	127.0	0
74	105	79/02/03	2356	48 25.50	125 28.30	124.9	5
75	104	79/02/04	0056	48 28.90	125 21.80	135.8	0
76	103	79/02/04	0140	48 32.20	125 15.50	106.3	4
77	102	79/02/04	0300	48 35.60	125 9.00	109.2	0
78	101	79/02/04	0410	48 39.00	125 2.50	55.7	2
CRUISE # 02							
79	101	79/03/08	1727	48 39.00	125 2.50	60.7	0
80	102	79/03/08	1804	48 35.60	125 9.00	98.4	0
81	103	79/03/08	1842	48 32.20	125 15.50	102.4	0
82	104	79/03/08	1922	48 28.90	125 21.80	142.1	0
83	105	79/03/08	1959	48 25.50	125 28.30	127.2	0
84	106	79/03/08	2040	48 22.00	125 34.70	149.0	0
85	107	79/03/08	2119	48 18.60	125 41.20	148.0	0
86	108	79/03/08	2158	48 15.10	125 47.70	210.6	0
87	109	79/03/08	2227	48 12.90	125 52.00	428.7	0
CRUISE # 03							
88	101	79/04/19	1219	48 39.00	125 2.50	50.7	0
89	102	79/04/19	1256	48 35.60	125 9.00	110.3	0
90	103	79/04/19	1342	48 32.20	125 15.50	112.1	0
91	104	79/04/19	1424	48 28.90	125 21.80	149.1	0
92	105	79/04/19	1510	48 25.50	125 28.30	151.0	4
93	106	79/04/19	1604	48 22.00	125 34.70	134.1	0
94	107	79/04/19	1649	48 18.60	125 41.20	138.1	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
95	108	79/04/19	1735	48 15.10	125 47.70	101.2	0
96	109	79/04/19	1830	48 12.90	125 52.00	498.9	0
97	110	79/04/19	1914	48 10.60	125 56.20	498.6	0
98	111	79/04/19	1953	48 8.50	126 .00	495.8	0
CRUISE # 04							
99	111	79/05/18	1630	48 8.50	126 .00	491.0	10
100	110	79/05/18	1638	48 10.60	125 56.20	487.2	0
101	109	79/05/18	1730	48 12.90	125 52.00	494.8	10
102	108	79/05/18	1816	48 15.10	125 47.70	192.8	0
103	107	79/05/18	1914	48 18.60	125 41.20	131.2	4
104	106	79/05/18	2003	48 22.00	125 34.70	135.3	0
105	104	79/05/18	2141	48 28.90	125 21.80	138.2	0
106	103	79/05/18	2247	48 32.20	125 15.50	91.5	3
107	102	79/05/18	2355	48 35.60	125 9.00	81.3	0
108	101	79/05/19	0049	48 39.00	125 2.50	40.6	0
109	201	79/05/21	1009	48 25.00	125 59.80	222.1	0
110	202	79/05/21	1132	48 31.50	126 7.00	330.3	0
111	203	79/05/21	1253	48 35.80	126 12.70	164.7	0
112	204	79/05/21	1410	48 41.40	126 19.10	511.5	0
113	205	79/05/21	1534	48 48.00	126 26.00	172.5	0
114	206	79/05/21	1650	48 54.00	126 33.00	408.9	0
115	207	79/05/21	1826	49 1.30	126 41.80	150.0	0
116	208	79/05/21	1943	49 7.30	126 48.90	147.7	0
117	209	79/05/21	2100	49 13.70	126 57.10	139.0	0
118	210	79/05/21	2214	49 21.53	127 5.60	500.8	0
119	211	79/05/21	2344	49 28.37	127 13.72	507.8	0
120	212	79/05/22	0115	49 33.64	127 20.38	136.0	0
121	213	79/05/22	0236	49 38.80	127 27.00	354.0	0
122	214	79/05/22	0328	49 42.70	127 32.10	522.6	0
123	107	79/05/23	1300	48 18.60	125 41.20	147.2	0
124	107	79/05/23	1329	48 18.60	125 41.20	150.8	0
125	107	79/05/23	1400	48 18.60	125 41.20	150.8	0
126	107	79/05/23	1429	48 18.60	125 41.20	150.2	0
127	107	79/05/23	1500	48 18.60	125 41.20	141.8	0
128	107	79/05/23	1530	48 18.60	125 41.20	141.0	0
129	107	79/05/23	1600	48 18.60	125 41.20	141.9	0
130	107	79/05/23	1630	48 18.60	125 41.20	140.0	0
131	107	79/05/23	1700	48 18.60	125 41.20	142.8	0
132	107	79/05/23	1730	48 18.60	125 41.20	141.7	0
133	107	79/05/23	1800	48 18.60	125 41.20	146.1	0
134	107	79/05/23	1832	48 18.60	125 41.20	143.0	0
135	107	79/05/23	1902	48 18.60	125 41.20	137.1	0
136	107	79/05/23	1931	48 18.60	125 41.20	139.1	0
137	107	79/05/23	2004	48 18.60	125 41.20	138.2	0
138	107	79/05/23	2035	48 18.60	125 41.20	138.7	0
139	107	79/05/23	2101	48 18.60	125 41.20	138.2	0
140	107	79/05/23	2131	48 18.60	125 41.20	136.0	0
141	107	79/05/23	2205	48 18.60	125 41.20	136.0	0
142	107	79/05/23	2231	48 18.60	125 41.20	136.1	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
143	107	79/05/23	2300	48 18.60	125 41.20	151.1	0
144	107	79/05/23	2330	48 18.60	125 41.20	152.7	0
145	107	79/05/24	0000	48 18.60	125 41.20	152.1	0
146	107	79/05/24	0030	48 18.60	125 41.20	152.1	0
147	107	79/05/24	0101	48 18.60	125 41.20	150.0	0
148	111	79/05/24	0247	48 8.50	126 .00	503.7	0
149	110	79/05/24	0333	48 10.60	125 56.20	500.7	0
150	109	79/05/24	0445	48 12.90	125 52.00	435.6	0
151	108	79/05/24	0528	48 15.10	125 47.70	235.0	0
152	107	79/05/24	0607	48 18.60	125 41.20	142.1	0
153	106	79/05/24	0644	48 22.00	125 34.70	141.1	0
154	105	79/05/24	0722	48 25.50	125 28.30	113.3	0
155	104	79/05/24	0759	48 28.90	125 21.80	141.9	0
156	103	79/05/24	0838	48 32.20	125 15.50	114.3	0
157	102	79/05/24	0919	48 35.60	125 9.00	91.3	0
158	101	79/05/24	1003	48 39.00	125 2.50	45.8	0
CRUISE # 05							
159	109	79/06/21	0028	48 12.90	125 52.00	417.5	0
160	108	79/06/22	0116	48 15.10	125 47.70	209.3	0
161	107	79/06/22	0202	48 18.60	125 41.20	145.8	0
162	106	79/06/22	0245	48 22.00	125 34.70	142.0	0
163	105	79/06/22	0332	48 25.50	125 28.30	130.7	0
164	104	79/06/22	0414	48 28.90	125 21.80	151.9	0
165	103	79/06/22	0504	48 32.20	125 15.50	112.9	0
166	102	79/06/22	0551	48 35.60	125 9.00	109.0	0
167	101	79/06/22	0643	48 39.00	125 2.50	51.9	0
CRUISE # 07							
186	111	79/10/12	2111	48 8.50	126 .00	496.9	10
187	110	79/10/12	2243	48 10.60	125 56.20	497.7	0
188	109	79/10/12	2336	48 12.90	125 52.00	501.0	10
189	108	79/10/13	0113	48 15.10	125 47.70	225.4	0
190	107	79/10/13	0203	48 18.60	125 41.20	154.1	6
191	106	79/10/13	0310	48 22.00	125 34.70	148.8	0
192	105	79/10/13	0353	48 25.50	125 28.30	130.1	5
193	104	79/10/13	0453	48 28.90	125 21.80	148.9	0
194	103	79/10/13	0508	48 32.20	125 15.50	114.3	5
195	102	79/10/13	0646	48 35.60	125 9.00	110.0	0
196	101	79/10/13	0730	48 39.00	125 2.50	68.6	2
CRUISE # 08							
197	111	79/11/27	1651	48 8.50	126 .00	500.7	10
198	110	79/11/27	1902	48 10.60	125 56.20	498.0	0
199	109	79/11/27	2014	48 12.90	125 52.00	396.8	0
200	108	79/11/27	2137	48 15.10	125 47.70	185.6	0
201	107	79/11/27	2323	48 18.60	125 41.20	131.3	0
202	106	79/11/28	0040	48 22.00	125 34.70	125.3	0
203	105	79/11/28	0150	48 25.50	125 28.30	141.1	0
204	104	79/11/28	0309	48 28.90	125 21.80	139.9	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
205	103	79/11/28	0407	48 32.20	125 15.50	92.3	0
206	102	79/11/28	0501	48 35.60	125 9.00	91.4	0
207	101	79/11/28	0542	48 39.00	125 2.50	39.9	0
208	W.C. 25	79/12/01	1228	49 21.50	126 44.50	87.5	0
209	W.C. 24	79/12/01	1344	49 15.50	126 53.00	114.1	0
210	W.C. 23	79/12/01	1458	49 10.00	127 2.00	356.2	0
211	W.C. 22	79/12/01	1601	49 4.50	127 11.00	1134.8	0
212	W.C. 21	79/12/01	1746	48 59.00	127 19.50	1176.9	0
213	W.C. 20	79/12/01	1932	48 53.50	127 29.00	1201.8	0
214	W.C. 19	79/12/01	2101	48 48.00	127 37.50	1184.9	0
215	W.C. 18	79/12/01	2252	48 42.00	127 46.00	1127.4	0
216	W.C. 40	79/12/02	0611	49 31.50	128 52.50	1132.5	0
217	W.C. 41	79/12/02	0803	49 36.50	128 44.50	1223.4	10
218	W.C. 42	79/12/02	0952	49 42.00	128 36.50	1081.5	0
219	W.C. 43	79/12/02	1112	49 47.00	128 28.50	1121.8	10
220	W.C. 44	79/12/02	1305	49 51.50	128 20.50	1208.6	0
221	W.C. 45	79/12/02	1413	49 57.00	128 12.50	1013.0	9
222	W.C. 46	79/12/02	1614	50 1.50	128 5.50	639.3	0
223	W.C. 47	79/12/02	1739	50 6.00	127 58.00	74.8	5
CRUISE # 09							
224	101	80/02/07	1830	48 39.00	125 2.50	40.9	2
225	102	80/02/07	1930	48 35.60	125 9.00	103.3	0
226	103	80/02/07	2028	48 32.20	125 15.50	105.3	4
227	104	80/02/07	2136	48 28.90	125 21.80	142.1	0
228	105	80/02/07	2230	48 25.50	125 28.30	125.1	5
229	106	80/02/07	2340	48 22.00	125 34.70	121.1	0
230	107	80/02/08	0037	48 18.60	125 41.20	142.2	5
231	108	80/02/08	0145	48 15.10	125 47.70	144.1	0
232	109	80/02/08	0232	48 12.90	125 52.00	498.1	10
233	110	80/02/08	0353	48 10.60	125 56.20	499.7	0
234	111	80/02/08	0518	48 8.50	126 .00	496.0	10
235	B.S. 8	80/02/08	0632	48 19.20	126 2.50	502.1	10
236	B.S. 7	80/02/08	0753	48 23.80	125 57.40	408.7	0
237	B.S. 6	80/02/08	0859	48 28.00	125 51.50	116.3	4
238	B.S. 5	80/02/08	1000	48 32.20	125 45.70	81.5	0
239	B.S. 4	80/02/08	1040	48 36.40	125 40.10	59.4	2
240	B.S. 3	80/02/08	1126	48 40.40	125 34.50	178.9	0
241	B.S. 2	80/02/08	1206	48 44.40	125 29.10	115.3	5
242	B.S. 1	80/02/08	1257	48 48.20	125 23.70	93.2	0
243	W.C. 09	80/02/11	0417	48 2.30	126 20.00	1147.6	0
244	W.C. 10	80/02/11	0534	48 6.50	126 29.50	1207.3	0
245	W.C. 11	80/02/11	0700	48 11.00	126 39.50	1177.0	0
246	W.C. 12	80/02/11	0822	48 16.00	126 49.50	1206.4	0
247	W.C. 13	80/02/11	0954	48 20.50	127 .00	1155.5	0
248	W.C. 14	80/02/11	1114	48 25.00	127 9.50	1198.4	0
249	W.C. 15	80/02/11	1301	48 30.00	127 20.00	1198.5	0
250	W.C. 16	80/02/11	1416	48 34.50	127 30.00	1205.8	0
251	W.C. 17	80/02/11	1536	48 39.50	127 40.00	1185.1	0
252	W.C. 18	80/02/11	1646	48 42.00	127 46.00	1185.8	0

FILE \#	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
253	W.C. 19	80/02/11	1821	48 48.00	127 37.50	1209.7	0
254	W.C. 20	80/02/11	1925	48 53.50	127 29.00	1188.8	0
255	W.C. 21	80/02/11	2115	48 59.00	127 19.50	1195.8	0
256	W.C. 22	80/02/11	2301	49 4.50	127 11.00	1020.9	0
257	W.C. 23	80/02/11	0027	49 10.00	127 2.00	373.8	0
258	W.C. 24	80/02/12	0128	49 15.50	126 53.00	145.0	0
259	W.C. 25	80/02/12	0436	49 21.50	126 44.50	85.5	0
260	W.C. 56	80/02/12	0334	48 51.50	127 17.00	1189.7	0
261	W.C. 57	80/02/13	0448	48 50.00	127 5.00	864.9	0
262	W.C. 58	80/02/13	0611	48 48.50	126 52.50	309.6	0
263	W.C. 59	80/02/13	0719	48 46.50	126 40.00	869.9	0
264	W.C. 60	80/02/13	0832	48 45.50	126 27.50	467.1	0
265	W.C. 61	80/02/13	0934	48 43.50	126 16.00	391.2	0
266	W.C. 62	80/02/13	1038	48 41.50	126 2.50	112.4	0
267	W.C. 63	80/02/13	1130	48 40.00	125 51.50	72.4	0
268	W.C. 64	80/02/13	1220	48 38.50	125 40.00	54.6	0
CRUISE	# 10						
269	101	80/03/25	0831	48 39.00	125 2.50	44.5	2
270	102	80/03/25	0918	48 35.60	125 9.00	96.3	0
271	103	80/03/25	1001	48 32.20	125 15.50	103.5	4
272	104	80/03/25	1052	48 28.90	125 21.80	139.0	0
273	105	80/03/25	1226	48 25.50	125 28.30	114.2	4
274	106	80/03/25	1314	48 22.00	125 34.70	137.2	0
275	107	80/03/25	1415	48 18.60	125 41.20	145.8	5
276	108	80/03/25	1520	48 15.10	125 47.70	153.8	0
277	109	80/03/25	1553	48 12.90	125 52.00	493.7	10
278	110	80/03/25	1748	48 10.60	125 56.20	390.8	0
279	111	80/03/25	1842	48 8.50	126 .00	498.9	0
280	B.S. 8	80/03/25	2040	48 19.20	126 2.50	497.9	0
281	B.S. 7	80/03/25	2147	48 23.80	125 57.40	271.1	0
282	B.S. 6	80/03/25	2235	48 28.00	125 51.50	128.1	0
283	B.S. 5	80/03/25	2316	48 32.20	125 45.70	83.3	0
284	B.S. 4	80/03/25	2357	48 36.40	125 40.10	56.7	0
285	B.S. 3	80/03/26	0039	48 40.40	125 34.50	108.2	0
286	B.S. 2	80/03/26	0117	48 44.40	125 29.10	116.4	0
287	B.S. 1	80/03/26	0158	48 48.20	125 23.70	89.3	0
CRUISE	# 11						
288	101	80/04/22	1505	48 39.00	125 2.50	54.8	2
289	102	80/04/22	1555	48 35.60	125 9.00	102.5	0
290	103	80/04/22	1640	48 32.20	125 15.50	114.3	4
291	104	80/04/22	1736	48 28.90	125 21.80	149.6	0
292	105	80/04/22	1825	48 25.50	125 28.30	136.1	5
293	106	80/04/22	1919	48 22.00	125 34.70	80.6	0
294	107	80/04/22	2026	48 18.60	125 41.20	135.1	6
295	108	80/04/22	2130	48 15.10	125 47.70	205.2	0
296	109	80/04/22	2200	48 12.90	125 52.00	500.7	10
297	110	80/04/22	2325	48 10.60	125 56.20	495.8	0
298	111	80/04/22	0015	48 8.50	126 .00	495.0	10

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
299	B.S. 8	80/04/23	0243	48 19.20	126 2.50	499.6	10
300	B.S. 7	80/04/23	0419	48 23.80	125 57.40	416.9	0
301	B.S. 6	80/04/23	0513	48 28.00	125 51.50	114.4	4
302	B.S. 5	80/04/23	0617	48 32.20	125 45.70	81.3	0
303	B.S. 4	80/04/23	0659	48 36.40	125 40.10	49.5	2
304	B.S. 3	80/04/23	0741	48 40.40	125 34.50	175.9	0
305	B.S. 2	80/04/23	0820	48 44.40	125 29.10	112.4	5
306	B.S. 1	80/04/23	0911	48 48.20	125 23.70	92.4	0
CRUISE # 12							
318	111	80/06/11	1842	48 8.50	126 .00	502.8	10
319	110	80/06/11	1950	48 10.60	125 56.20	505.7	0
320	109	80/06/11	2040	48 12.90	125 52.00	498.7	10
321	108	80/06/11	2210	48 15.10	125 47.70	209.1	0
322	107	80/06/11	2309	48 18.60	125 41.20	154.0	6
323	106	80/06/12	0021	48 22.00	125 34.70	145.9	0
324	105	80/06/12	0106	48 25.50	125 28.30	153.6	5
325	104	80/06/12	0211	48 28.90	125 21.80	150.1	0
326	103	80/06/12	0258	48 32.20	125 15.50	116.2	4
327	102	80/06/12	0401	48 35.60	125 9.00	103.3	0
328	101	80/06/12	0450	48 39.00	125 2.50	53.5	2
329	100	80/06/12	0531	48 40.50	125 .00	36.7	0
330	B.S. 1	80/06/12	0707	48 48.20	125 23.70	83.5	0
331	B.S. 2	80/06/12	0746	48 44.40	125 29.10	118.1	4
332	B.S. 3	80/06/12	0845	48 40.40	125 34.50	176.9	0
333	B.S. 4	80/06/12	0935	48 36.40	125 40.10	53.4	2
334	B.S. 5	80/06/12	1025	48 32.20	125 45.70	84.1	0
335	B.S. 6	80/06/12	1113	48 28.00	125 51.50	114.0	5
336	B.S. 7	80/06/12	1214	48 23.80	125 57.40	440.2	0
337	B.S. 8	80/06/12	1326	48 19.20	126 2.50	479.3	10
338	A.P. 8	80/06/12	1532	48 24.40	126 15.42	503.0	10
339	A.P. 7	80/06/12	1648	48 29.06	126 9.48	246.3	0
340	A.P. 6	80/06/12	1741	48 33.24	126 4.00	133.0	5
341	A.P. 5	80/06/12	1846	48 37.36	125 58.16	96.5	0
342	A.P. 4	80/06/12	1937	48 41.41	125 52.38	63.6	3
343	A.P. 3	80/06/12	2022	48 45.39	125 47.05	76.7	0
344	A.P. 2	80/06/12	2108	48 49.32	125 41.36	52.8	2
345	A.P. 1	80/06/12	2155	48 53.19	125 36.12	41.3	0
346	W.B. 1	80/06/12	2320	49 1.12	125 50.08	40.8	2
347	W.B. 2	80/06/12	0005	48 57.31	125 55.32	58.7	0
348	W.B. 3	80/06/12	0050	48 53.43	126 1.01	73.5	3
349	W.B. 4	80/06/12	0141	48 49.50	126 6.35	100.2	0
350	W.B. 5	80/06/12	0232	48 45.51	126 12.14	132.1	6
351	W.B. 6	80/06/12	0331	48 41.46	126 17.57	487.2	0
352	W.B. 7	80/06/12	0424	48 37.34	126 23.47	502.5	10
CRUISE # 13							
363	A.P. 1	80/08/13	1440	48 53.19	125 36.12	55.4	0
364	A.P. 2	80/08/13	1518	48 49.32	125 41.36	53.2	2
365	A.P. 3	80/08/13	1604	48 45.39	125 47.05	70.8	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
366	A.P. 4	80/08/13	1645	48 41.41	125 52.38	64.5	3
367	A.P. 5	80/08/13	1735	48 37.36	125 58.16	102.2	0
368	A.P. 6	80/08/13	1819	48 33.24	126 4.00	137.7	5
369	A.P. 7	80/08/13	1921	48 29.06	126 9.48	226.5	0
370	A.P. 8	80/08/13	2017	48 24.40	126 15.42	484.0	0
371	111	80/08/13	2237	48 8.50	126 .00	510.6	0
372	110	80/08/13	2323	48 10.60	125 56.20	496.7	0
373	109	80/08/14	0008	48 12.90	125 52.00	499.0	0
374	108	80/08/14	0053	48 15.10	125 47.70	229.4	0
375	107	80/08/14	0144	48 18.60	125 41.20	152.8	7
376	106	80/08/14	0308	48 22.00	125 34.70	147.8	0
377	105	80/08/14	0348	48 25.50	125 28.30	132.1	6
378	104	80/08/14	0454	48 28.90	125 21.80	150.6	0
379	103	80/08/14	0532	48 32.20	125 15.50	103.4	4
380	102	80/08/14	0624	48 35.60	125 9.00	103.2	0
381	101	80/08/14	0710	48 39.00	125 2.50	44.7	3
CRUISE # 14							
382	A.P. 8	80/09/22	1500	48 24.40	126 15.42	497.1	10
383	A.P. 7	80/09/22	1631	48 29.06	126 9.48	252.8	0
384	A.P. 6	80/09/22	1725	48 33.24	126 4.00	147.1	5
385	A.P. 5	80/09/22	1825	48 37.36	125 58.16	105.3	0
386	A.P. 4	80/09/22	2014	48 41.41	125 52.38	60.6	3
387	A.P. 3	80/09/22	2107	48 45.39	125 47.05	62.5	0
388	A.P. 2	80/09/22	2147	48 49.32	125 41.36	50.9	2
389	A.P. 1	80/09/22	2231	48 53.19	125 36.12	57.4	0
390	B.S. 1	80/09/22	2337	48 48.20	125 23.70	81.1	0
391	B.S. 2	80/09/22	2317	48 44.40	125 29.10	121.2	5
392	B.S. 3	80/09/23	0010	48 40.40	125 34.50	188.8	0
393	B.S. 4	80/09/23	0050	48 36.40	125 40.10	54.6	2
394	B.S. 5	80/09/23	0148	48 32.20	125 45.70	89.5	0
395	B.S. 6	80/09/23	0234	48 28.00	125 51.50	122.2	5
396	B.S. 7	80/09/23	0325	48 23.80	125 57.40	344.4	0
397	B.S. 8	80/09/23	0420	48 19.20	126 2.50	465.3	10
398	111	80/09/23	0635	48 8.50	126 .00	504.8	10
399	110	80/09/23	0752	48 10.60	125 56.20	527.7	0
400	109	80/09/23	0830	48 12.90	125 52.00	500.2	10
401	108	80/09/23	0921	48 15.10	125 47.70	223.3	0
402	107	80/09/23	1004	48 18.60	125 41.20	139.0	7
403	106	80/09/23	1058	48 22.00	125 34.70	146.1	0
404	105	80/09/23	1134	48 25.50	125 28.30	131.4	6
405	104	80/09/23	1232	48 28.90	125 21.80	154.0	0
406	103	80/09/23	1312	48 32.20	125 15.50	113.2	5
407	102	80/09/23	1403	48 35.60	125 9.00	108.2	0
408	101	80/09/23	1440	48 39.00	125 2.50	58.7	3
409	N.L. 7	80/09/23	1520	48 34.35	125 .05	56.7	0
410	N.L. 6	80/09/23	1612	48 28.11	124 59.57	95.1	4
411	N.L. 5	80/09/23	1635	48 25.36	124 59.53	183.8	0
412	N.L. 4	80/09/23	1704	48 23.00	124 59.49	258.0	8
413	N.L. 3	80/09/23	1746	48 20.23	124 59.45	219.1	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
414	N.L. 2	80/09/23	1820	48 17.45	124 59.40	265.0	8
415	N.L. 1	80/09/23	1900	48 15.06	124 59.35	140.9	0
416	C.A.11	80/09/23	1924	48 13.21	124 56.37	135.0	0
417	C.A.10	80/09/23	1955	48 12.51	125 2.25	216.2	7
418	C.A. 9	80/09/23	2039	48 12.24	125 8.11	100.1	0
419	C.A. 8	80/09/23	2105	48 12.41	125 13.55	223.4	8
420	C.A. 7	80/09/23	2156	48 11.37	125 19.38	98.3	0
421	C.A. 6	80/09/23	2225	48 11.16	125 25.19	112.4	4
422	C.A. 5	80/09/23	2304	48 10.57	125 30.58	143.0	0
423	C.A. 4	80/09/23	2339	48 10.40	125 36.35	157.7	5
424	C.A. 3	80/09/24	0022	48 10.26	125 42.11	348.2	0
425	C.A. 2	80/09/24	0057	48 10.13	125 47.46	499.8	10
426	C.A. 1	80/09/24	0216	48 10.02	125 53.18	504.7	0
427	X. 1	80/09/24	0339	48 15.03	125 36.21	139.0	5
428	X. 2	80/09/24	0416	48 16.42	125 30.43	128.9	0
429	X. 3	80/09/24	0452	48 18.20	125 25.06	127.0	4
430	X. 4	80/09/24	0531	48 19.58	125 19.30	112.2	0
431	X. 5	80/09/24	0605	48 21.35	125 13.53	169.8	6
432	X. 6	80/09/24	0754	48 23.12	125 8.17	99.4	0
CRUISE # 15							
433	101	80/10/22	1857	48 39.00	125 2.50	53.4	3
434	102	80/10/22	1947	48 35.60	125 9.00	103.3	0
435	103	80/10/22	2030	48 32.20	125 15.50	103.4	5
436	104	80/10/22	2120	48 28.90	125 21.80	125.3	0
437	105	80/10/22	2208	48 25.50	125 28.30	153.8	7
438	106	80/10/22	2313	48 22.00	125 34.70	133.0	0
439	107	80/10/23	0003	48 18.60	125 41.20	141.9	7
440	108	80/10/23	0119	48 15.10	125 47.70	184.4	0
441	109	80/10/23	0153	48 12.90	125 52.00	397.0	0
442	110	80/10/23	0244	48 10.60	125 56.20	439.4	0
CRUISE # 16							
443	101	80/11/27	1249	48 39.00	125 2.50	79.6	0
CRUISE # 17							
444	101	81/01/06	0807	48 39.00	125 2.50	57.3	3
445	102	81/01/06	0912	48 35.60	125 9.00	113.3	0
446	103	81/01/06	0957	48 32.20	125 15.50	112.5	4
447	104	81/01/06	1048	48 28.90	125 21.80	150.0	0
448	105	81/01/06	1137	48 25.50	125 28.30	133.4	6
449	106	81/01/06	1229	48 22.00	125 34.70	147.0	0
450	107	81/01/06	1313	48 18.60	125 41.20	153.0	7
451	108	81/01/06	1410	48 15.10	125 47.70	231.4	0
452	109	81/01/06	1446	48 12.90	125 52.00	497.9	10
CRUISE # 18							
453	101	81/02/04	1838	48 39.00	125 2.50	50.7	2
454	102	81/02/04	1946	48 35.60	125 9.00	104.4	0
455	103	81/02/04	2033	48 32.20	125 15.50	106.1	4

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
456	104	81/02/04	2127	48 28.90	125 21.80	142.2	0
457	105	81/02/04	2220	48 25.50	125 28.30	146.0	6
458	106	81/02/04	2316	48 22.00	125 34.70	142.9	0
459	107	81/02/05	0010	48 18.60	125 41.20	142.9	6
460	108	81/02/05	0115	48 15.10	125 47.70	283.1	0
461	109	81/02/05	0201	48 12.90	125 52.00	447.5	10
462	110	81/02/05	0338	48 10.60	125 56.20	503.0	0
463	111	81/02/05	0424	48 8.50	126 .00	496.7	10
464	A.P. 8	81/02/05	0652	48 24.40	126 15.42	499.0	8
465	A.P. 7	81/02/05	0828	48 29.06	126 9.48	251.3	0
466	A.P. 6	81/02/05	0940	48 33.24	126 4.00	153.7	6
467	A.P. 5	81/02/05	1042	48 37.36	125 58.16	110.4	0
468	A.P. 4	81/02/05	1134	48 41.41	125 52.38	68.3	3
469	A.P. 3	81/02/05	1229	48 45.39	125 47.05	65.5	0
470	A.P. 2	81/02/05	1305	48 49.32	125 41.36	59.7	2
471	A.P. 1	81/02/05	1345	48 53.19	125 36.12	52.6	0
CRUISE # 19							
472	110	81/03/10	0830	48 10.60	125 56.20	501.8	0
473	109	81/03/10	0909	48 12.90	125 52.00	504.1	0
474	108	81/03/10	0950	48 15.10	125 47.70	207.8	0
475	107	81/03/10	1049	48 18.60	125 41.20	150.9	7
476	106	81/03/10	1217	48 22.00	125 34.70	143.1	0
477	105	81/03/10	1302	48 25.50	125 28.30	133.3	6
478	104	81/03/10	1407	48 28.90	125 21.80	147.1	0
479	103	81/03/10	1455	48 32.20	125 15.50	106.1	5
480	102	81/03/10	1552	48 35.60	125 9.00	114.4	0
481	101	81/03/10	1635	48 39.00	125 2.50	53.4	3
CRUISE # 20							
482	C.A.11	81/04/21	1208	48 13.21	124 56.37	150.0	0
483	C.A.10	81/04/21	1250	48 12.51	125 2.25	201.8	8
484	C.A. 9	81/04/21	1420	48 12.24	125 8.11	114.4	0
485	C.A. 8	81/04/21	1502	48 12.41	125 13.55	132.2	0
486	C.A. 7	81/04/21	1547	48 11.37	125 19.38	87.6	0
487	C.A. 6	81/04/21	1625	48 11.16	125 25.19	117.1	5
488	C.A. 5	81/04/21	1723	48 10.57	125 30.58	140.9	0
489	C.A. 4	81/04/21	1805	48 10.40	125 36.35	164.9	0
490	C.A. 3	81/04/21	1843	48 10.26	125 42.11	324.3	0
491	C.A. 2	81/04/21	1933	48 10.13	125 47.46	509.9	8
492	109	81/04/21	2135	48 12.90	125 52.00	494.0	0
493	108	81/04/21	2218	48 15.10	125 47.70	206.4	0
494	107	81/04/21	2309	48 18.60	125 41.20	153.9	6
495	106	81/04/22	0021	48 22.00	125 34.70	122.9	0
496	105	81/04/22	0106	48 25.50	125 28.30	128.0	6
497	104	81/04/22	0220	48 28.90	125 21.80	149.1	0
498	103	81/04/22	0300	48 32.20	125 15.50	105.2	5
499	102	81/04/22	0351	48 35.60	125 9.00	104.3	0
500	101	81/04/22	0432	48 39.00	125 2.50	55.7	3
CRUISE # 21							
534	C.F. 1	81/06/02	0655	48 21.00	124 51.20	115.4	4

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
535	C.F. 2	81/06/02	0739	48 22.90	124 51.40	242.3	0
536	C.F. 3	81/06/02	0812	48 25.50	124 51.60	283.5	9
537	C.F. 4	81/06/02	0903	48 28.00	124 51.70	241.1	0
538	C.F. 5	81/06/02	0952	48 31.10	124 51.80	141.0	6
539	C.F. 6	81/06/02	1013	48 33.00	124 52.00	84.2	0
540	C.F. 7	81/06/02	1039	48 35.50	124 52.20	57.5	3
541	N.L. 7	81/06/02	1130	48 34.35	125 .05	54.7	0
542	N.L. 6	81/06/02	1220	48 28.11	124 59.57	89.4	5
543	N.L. 5	81/06/02	1301	48 25.36	124 59.53	222.2	0
544	N.L. 4	81/06/02	1330	48 23.00	124 59.49	231.3	8
545	N.L. 3	81/06/02	1425	48 20.23	124 59.45	207.4	0
546	N.L. 2	81/06/02	1509	48 17.45	124 59.40	260.0	9
547	N.L. 1	81/06/02	1612	48 15.06	124 59.35	165.6	0
548	C.A.11	81/06/02	1643	48 13.21	124 56.37	127.0	0
549	C.A.10	81/06/02	1729	48 12.51	125 2.25	221.4	9
550	C.A. 9	81/06/02	1843	48 12.24	125 8.11	108.1	0
551	C.A. 8	81/06/02	1932	48 12.41	125 13.55	212.1	8
552	C.A. 7	81/06/02	2044	48 11.37	125 19.38	103.2	0
553	C.A. 6	81/06/02	2135	48 11.16	125 25.19	113.9	5
554	C.A. 5	81/06/02	2230	48 10.57	125 30.58	137.1	0
555	C.A. 4	81/06/02	2315	48 10.40	125 36.35	139.1	6
556	C.A. 3	81/06/03	0005	48 10.26	125 42.11	370.1	0
557	C.A. 2	81/06/03	0150	48 10.13	125 47.46	531.6	10
558	C.A. 1	81/06/03	0215	48 10.02	125 53.18	528.8	0
559	X. 1	81/06/03	0355	48 15.03	125 36.21	137.0	6
560	X. 2	81/06/03	0446	48 16.42	125 30.43	117.3	0
561	X. 3	81/06/03	0521	48 18.20	125 25.06	122.0	6
562	X. 4	81/06/03	0609	48 19.58	125 19.30	100.1	0
563	X. 5	81/06/03	0647	48 21.35	125 13.53	167.7	7
564	X. 6	81/06/03	0745	48 23.12	125 8.17	106.3	0
565	X. 7	81/06/03	0812	48 24.48	125 2.41	106.0	5
566	101	81/06/03	1842	48 39.00	125 2.50	54.5	3
567	102	81/06/03	1926	48 35.60	125 9.00	104.2	0
568	103	81/06/03	2002	48 32.20	125 15.50	105.2	5
569	104	81/06/03	2045	48 28.90	125 21.80	150.7	0
570	105	81/06/03	2131	48 25.50	125 28.30	129.9	6
571	106	81/06/03	2222	48 22.00	125 34.70	143.8	0
572	107	81/06/03	2315	48 18.60	125 41.20	147.0	6
573	108	81/06/04	0021	48 15.10	125 47.70	216.2	0
574	109	81/06/04	0100	48 12.90	125 52.00	512.0	10
575	110	81/06/04	0225	48 10.60	125 56.20	531.5	0
576	111	81/06/04	0334	48 8.50	126 .00	500.1	10
577	B.S. 8	81/06/04	1355	48 19.20	126 2.50	533.6	0
578	B.S. 7	81/06/04	1456	48 23.80	125 57.40	429.3	0
579	B.S. 6	81/06/04	1552	48 28.00	125 51.50	115.3	0
580	B.S. 5	81/06/04	1637	48 32.20	125 45.70	82.3	0
581	B.S. 4	81/06/04	1720	48 36.40	125 40.10	47.5	0
582	B.S. 3	81/06/04	1801	48 40.40	125 34.50	177.8	0
583	B.S. 2	81/06/04	1847	48 44.40	125 29.10	115.3	0
584	B.S. 1	81/06/04	1926	48 43.20	125 23.70	84.4	0

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
585	A.P. 1	81/06/04	2032	48 53.19	125 36.12	45.5	0
586	A.P. 2	81/06/04	2106	48 49.32	125 41.36	47.5	0
587	A.P. 3	81/06/04	2143	48 45.39	125 47.05	69.3	0
588	A.P. 4	81/06/04	2219	48 41.41	125 52.38	64.7	0
589	A.P. 5	81/06/04	2254	48 37.36	125 58.16	104.5	0
590	A.P. 6	81/06/04	2330	48 33.24	126 4.00	140.9	0
591	A.P. 7	81/06/05	0014	48 29.06	126 9.48	243.2	0
592	A.P. 8	81/06/05	0100	48 24.40	126 15.42	533.6	0
593	W.B. 7	81/06/05	0247	48 37.34	126 23.47	554.5	0
594	W.B. 6	81/06/05	0355	48 41.46	126 17.57	503.6	0
595	W.B. 5	81/06/05	0451	48 45.51	126 12.14	139.0	0
596	W.B. 4	81/06/05	0538	48 49.50	126 6.35	96.5	0
597	W.B. 3	81/06/05	0625	48 53.43	126 1.01	62.3	0
598	W.B. 2	81/06/05	0705	48 57.31	125 55.32	48.8	0
599	W.B. 1	81/06/05	0741	49 1.12	125 50.08	36.8	0
600	101	81/06/08	1915	48 39.00	125 2.50	57.4	0
601	102	81/06/08	1956	48 35.60	125 9.00	107.9	0
602	103	81/06/08	2105	48 32.20	125 15.50	108.9	5
603	104	81/06/08	2200	48 28.90	125 21.80	147.9	0
604	105	81/06/09	2306	48 25.50	125 28.30	131.1	6
605	106	81/06/09	0003	48 22.00	125 34.70	144.2	0
606	107	81/06/09	0056	48 18.60	125 41.20	152.9	7
607	108	81/06/09	0208	48 15.10	125 47.70	221.4	0
608	109	81/06/09	0243	48 12.90	125 52.00	504.7	10
609	110	81/06/09	0410	48 10.60	125 56.20	506.0	0
610	111	81/06/09	0450	48 8.50	126 .00	501.1	10
611	112	81/06/09	1022	48 5.60	126 5.80	1199.9	0
CRUISE # 22							
612	K.I. 1	81/09/05	0700	50 23.40	128 7.50	87.4	0
613	K.I. 2	81/09/05	0742	50 20.00	128 13.80	165.8	0
614	K.I. 3	81/09/05	0831	50 16.30	128 20.50	496.9	0
615	K.I. 4	81/09/05	0939	50 12.60	128 27.00	496.8	0
616	K.I. 5	81/09/05	1041	50 8.90	128 34.00	488.9	0
617	K.I. 6	81/09/05	1143	50 5.00	128 40.80	495.7	0
618	K.S. 1	81/09/05	1641	49 53.70	127 30.30	64.5	0
619	K.S. 2	81/09/05	1717	49 50.00	127 36.00	93.3	0
620	K.S. 3	81/09/05	1757	49 46.40	127 42.10	494.1	0
621	K.S. 4	81/09/05	1845	49 42.70	127 48.30	495.1	0
622	K.S. 5	81/09/05	1940	49 38.90	127 54.80	493.2	0
623	K.S. 6	81/09/05	2035	49 35.00	128 1.10	487.0	0
624	101	81/09/06	1516	48 39.00	125 2.50	45.5	3
625	102	81/09/06	1607	48 35.60	125 9.00	106.3	0
626	103	81/09/06	1648	48 32.20	125 15.50	112.4	5
627	104	81/09/06	1735	48 28.90	125 21.80	139.9	0
628	105	81/09/06	1828	48 25.50	125 28.30	126.1	6
629	106	81/09/06	1919	48 22.00	125 34.70	141.9	0
630	107	81/09/06	2008	48 18.60	125 41.20	142.1	7
631	108	81/09/06	2111	48 15.10	125 47.70	201.3	0
632	109	81/09/06	2153	48 12.90	125 52.00	495.1	10

FILE #	STATION	DATE YR/MO/DY	TIME (PST)	LATITUDE (N)	LONGITUDE (W)	MXDEP (M)	DO
633	110	81/09/06	2304	48 10.60	125 56.20	499.0	0
634	111	81/09/06	0710	48 8.50	126 .00	490.9	10

Data Listings 1979

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE                             TAPE: U00454   -001
LAT  N 48 39.00                                  LONG W 125  2.50
DATE 30/ 1/79                                    PASS NO. 31
TIME (PST) 2224                                  STN: 101

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   2.1        2.1      31.66       6.12     24.90
   4.7        4.8      31.67       6.09     24.92
   9.9        9.9      31.69       6.13     24.92
  14.9       15.0      31.71       6.20     24.93
  20.0       20.1      31.83       6.54     24.99
  24.9       25.0      31.98       6.67     25.08
  31.1       31.3      32.16       6.87     25.20
  34.9       35.1      32.20       6.91     25.23
  39.7       39.9      32.24       6.97     25.25
  44.7       45.0      32.25       6.98     25.26
  49.7       50.0      32.26       6.99     25.26
  54.5       54.8      32.26       6.99     25.26

CRUISE NO:  01   CODE                            TAPE: U00454   -002
LAT  N 48 35.60                                  LONG W 125  9.00
DATE 30/ 1/79                                    PASS NO. 33
TIME (PST) 2301                                  STN: 102

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
    .7         .7      32.07       6.49     25.18
   2.0        2.0      32.07       6.50     25.18
   4.9        5.0      32.07       6.48     25.18
   9.9        9.9      32.12       6.60     25.21
  14.8       14.9      32.12       6.60     25.21
  19.9       20.0      32.12       6.60     25.21
  24.9       25.0      32.13       6.62     25.21
  30.2       30.3      32.21       6.79     25.25
  34.9       35.1      32.23       6.85     25.26
  39.8       40.0      32.25       6.86     25.28
  44.6       44.9      32.26       6.86     25.28
  49.8       50.0      32.31       6.89     25.31
  59.8       60.1      32.46       7.09     25.41
  69.4       69.9      32.61       7.26     25.51
  79.6       80.0      32.62       7.27     25.51
  90.2       90.8      32.73       7.40     25.58
 101.0      101.6      32.93       7.57     25.71
 103.3      104.0      32.98       7.61     25.74
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 32.20
DATE 30/ 1/79
TIME (PST) 2342

TAPE: U00454 -003
LONG W 125 15.50
PASS NO. 35
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	32.14	6.79	25.19
2.0	2.0	32.14	6.79	25.19
5.0	5.0	32.13	6.79	25.19
9.9	10.0	32.15	6.84	25.20
14.9	15.0	32.17	6.87	25.21
19.8	20.0	32.18	6.89	25.21
24.9	25.0	32.19	6.91	25.22
30.4	30.5	32.20	6.91	25.22
34.8	35.0	32.19	6.92	25.22
39.7	39.9	32.22	6.97	25.24
44.8	45.0	32.39	7.18	25.34
49.6	49.9	32.70	7.43	25.55
59.6	60.0	32.92	7.79	25.67
69.6	70.0	33.06	7.64	25.80
80.1	80.6	33.17	7.71	25.88
90.5	91.0	33.26	7.77	25.95
100.3	100.9	33.43	7.73	26.08
103.1	103.7	33.45	7.73	26.10

CRUISE NO: 01 CODE
LAT N 48 28.90
DATE 31/ 1/79
TIME (PST) 0032

TAPE: U00454 -004
LONG W 125 21.80
PASS NO. 37
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	32.23	6.97	25.24
2.2	2.2	32.23	6.97	25.24
5.0	5.0	32.23	6.97	25.24
10.0	10.0	32.23	6.97	25.24
14.9	15.0	32.23	6.97	25.24
19.8	19.9	32.23	6.97	25.24
24.8	25.0	32.23	7.00	25.24
29.7	29.9	32.32	7.15	25.29
34.9	35.1	32.69	7.71	25.50
39.8	40.0	32.83	8.03	25.57
44.8	45.0	32.98	7.90	25.70
49.7	50.0	33.07	7.84	25.78
59.7	60.0	33.23	7.88	25.90
69.7	70.1	33.33	7.91	25.98
79.6	80.1	33.48	7.81	26.11
90.4	91.0	33.59	7.75	26.20
100.3	100.9	33.65	7.80	26.25
110.3	111.0	33.69	7.74	26.29
120.2	121.0	33.70	7.73	26.29
130.0	130.9	33.71	7.68	26.31
137.9	138.9	33.71	7.65	26.31

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE                              TAPE: U00454   -005
LAT  N 48 25.50                                   LONG W 125 28.30
DATE 31/ 1/79                                     PASS NO. 39
TIME (PST) 0119                                   STN: 105

 DEPTH      PRESS        SAL        TEMP    SIGMA-T
    .1         .1      32.25        6.93     25.27
   2.0        2.0      32.25        6.93     25.27
   4.9        5.0      32.26        6.93     25.27
  10.0       10.0      32.26        6.94     25.27
  14.9       15.0      32.26        6.94     25.27
  19.9       20.0      32.26        6.93     25.27
  25.0       25.2      32.26        6.93     25.27
  29.9       30.0      32.28        6.92     25.29
  34.8       35.1      32.30        6.98     25.29
  39.8       40.0      32.70        7.57     25.54
  44.8       45.0      32.96        8.06     25.67
  49.6       49.9      33.03        8.04     25.72
  60.1       60.5      33.25        7.90     25.92
  70.5       70.9      33.43        7.84     26.07
  79.5       80.0      33.51        7.77     26.14
  90.4       91.0      33.55        7.79     26.17
 100.6      101.3      33.57        7.84     26.18
 110.2      110.9      33.61        7.82     26.21
 120.3      121.1      33.63        7.80     26.23
 122.0      122.8      33.64        7.79     26.24

CRUISE NO:  01   CODE                             TAPE: U00454   -006
LAT  N 48 22.00                                   LONG W 125 34.70
DATE 31/ 1/79                                     PASS NO. 41
TIME (PST) 0151                                   STN: 106

 DEPTH      PRESS        SAL        TEMP    SIGMA-T
    .4         .4      32.18        6.78     25.23
   2.7        2.7      32.18        6.78     25.23
   5.0        5.0      32.18        6.78     25.23
  10.1       10.1      32.19        6.80     25.24
  14.9       15.0      32.19        6.81     25.23
  19.9       20.0      32.19        6.85     25.23
  24.8       25.0      32.24        6.94     25.26
  29.8       30.0      32.28        6.96     25.28
  34.8       35.1      32.31        6.90     25.31
  39.8       40.1      32.43        7.13     25.38
  44.7       45.0      32.64        7.37     25.51
  49.7       50.0      32.81        7.62     25.61
  59.6       60.0      33.23        7.88     25.91
  69.5       70.0      33.33        7.86     25.98
  79.5       80.0      33.38        7.84     26.03
  90.4       91.0      33.48        7.82     26.11
 100.4      101.0      33.49        7.81     26.12
 110.3      111.0      33.55        7.79     26.17
 120.1      120.9      33.63        7.75     26.23
 125.2      126.0      33.63        7.75     26.23
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 18.60
DATE 31/ 1/79
TIME (PST) 0236

TAPE: U00454 -007
LONG W 125 41.20
PASS NO. 43
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	31.49	6.36	24.74
2.1	2.1	31.48	6.36	24.73
5.0	5.1	31.48	6.37	24.73
10.0	10.0	31.50	6.41	24.74
14.9	15.0	31.69	6.81	24.84
19.9	20.0	32.00	7.35	25.01
24.9	25.0	32.19	7.65	25.12
29.8	30.0	32.31	7.91	25.17
34.8	35.0	32.34	7.96	25.19
39.8	40.0	32.43	8.14	25.24
44.9	45.2	32.42	8.00	25.25
49.7	50.0	32.53	8.40	25.28
59.8	60.1	32.59	8.38	25.33
69.6	70.0	32.67	8.07	25.43
80.4	80.9	33.00	7.99	25.71
90.5	91.0	33.21	7.94	25.88
100.3	100.9	33.37	7.85	26.02
110.3	111.0	33.54	7.88	26.14
120.3	121.0	33.68	7.73	26.28
130.2	131.1	33.84	7.63	26.41
138.1	139.0	33.84	7.60	26.43

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 15.10
DATE 31/ 1/79
TIME (PST) 0320

TAPE: U00454 -008
LONG W 125 47.70
PASS NO. 45
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	31.44	6.54	24.68
1.8	1.8	31.44	6.54	24.68
5.0	5.0	31.46	6.59	24.69
9.7	9.7	31.56	6.76	24.75
14.9	15.0	31.66	6.87	24.81
20.0	20.1	31.78	7.04	24.88
25.0	25.2	31.79	7.02	24.89
30.9	31.0	31.82	7.05	24.91
34.8	34.9	32.02	7.50	25.00
39.9	40.1	32.32	8.03	25.17
44.7	45.0	32.51	8.28	25.28
49.5	49.8	32.56	8.30	25.31
60.0	60.3	32.66	8.10	25.42
69.7	70.1	32.81	8.27	25.52
80.4	80.9	33.05	8.31	25.70
89.5	90.0	33.29	8.29	25.89
100.5	101.1	33.47	8.24	26.04
110.3	111.0	33.55	8.22	26.10
120.3	121.1	33.62	8.16	26.17
130.2	131.0	33.66	8.15	26.20
140.1	141.0	33.72	8.04	26.26
150.1	151.1	33.77	7.95	26.32
160.0	161.1	33.82	7.91	26.36
169.8	171.0	33.86	7.74	26.42
172.9	174.0	33.88	7.62	26.45

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 12.90
DATE 31/ 1/79
TIME (PST) 0359

TAPE: U00454 -009
LONG W 125 52.00
PASS NO. 47
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	31.78	6.92	24.89
2.0	2.0	31.77	6.93	24.89
5.0	5.0	31.77	6.93	24.89
10.0	10.1	31.77	6.92	24.89
14.9	15.0	31.78	6.99	24.89
20.0	20.1	31.89	7.15	24.95
24.9	25.0	31.94	7.22	24.98
29.9	30.0	32.14	7.75	25.06
34.8	35.0	32.37	8.12	25.20
39.8	40.0	32.47	8.29	25.25
44.7	45.0	32.51	8.34	25.27
49.7	50.0	32.54	8.37	25.29
59.7	60.0	32.60	8.36	25.34
69.6	70.0	32.80	8.17	25.52
80.4	80.9	32.97	8.18	25.65
90.4	91.0	33.14	8.25	25.78
99.6	100.2	33.34	8.29	25.93
110.3	111.0	33.48	8.19	26.06
120.3	121.0	33.60	8.04	26.17
130.3	131.1	33.68	7.97	26.24
140.1	141.0	33.77	7.81	26.34
150.0	150.9	33.81	7.74	26.38
160.0	161.0	33.87	7.59	26.45
170.0	171.1	33.89	7.58	26.46
179.8	181.0	33.92	7.49	26.50
189.7	191.0	33.94	7.45	26.52
199.7	201.0	33.95	7.38	26.54
224.5	226.1	33.97	7.12	26.60
250.3	252.1	34.00	6.93	26.64
274.9	276.9	34.00	6.67	26.68
299.8	301.9	34.01	6.24	26.75
324.7	327.1	34.05	6.02	26.80
350.4	353.0	34.07	5.61	26.86
375.2	378.0	34.08	5.40	26.90
394.0	397.1	34.09	5.35	26.91

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 10.60
DATE 31/ 1/79
TIME (PST) 0452

TAPE: U00454 -010
LONG W 125 56.20
PASS NO. 49
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	32.20	7.54	25.14
2.1	2.1	32.20	7.54	25.14
4.9	5.0	32.20	7.55	25.14
10.0	10.0	32.20	7.55	25.14
15.0	15.1	32.32	7.89	25.19
19.9	20.0	32.38	7.91	25.23
24.8	24.9	32.39	7.94	25.24
29.8	29.9	32.42	7.95	25.26
35.5	35.7	32.43	7.92	25.27
39.8	40.1	32.45	7.94	25.28
44.7	45.0	32.48	7.98	25.30
49.6	49.9	32.52	8.11	25.31
59.7	60.1	32.76	8.32	25.47
70.2	70.6	32.87	8.32	25.56
79.5	79.9	33.08	8.34	25.72
90.4	91.0	33.23	8.38	25.83
100.3	100.9	33.44	8.29	26.01
110.3	111.0	33.53	8.24	26.09
120.4	121.1	33.64	8.13	26.19
130.1	130.9	33.74	7.87	26.30
140.8	141.7	33.79	7.79	26.36
150.1	151.1	33.83	7.74	26.40
160.0	161.1	33.85	7.67	26.42
169.8	171.0	33.86	7.47	26.46
179.9	181.1	33.89	7.35	26.50
189.7	191.0	33.92	7.27	26.53
199.7	201.0	33.93	7.17	26.56
225.4	227.0	33.98	7.05	26.61
250.2	252.0	33.99	6.82	26.65
275.1	277.0	34.01	6.67	26.69
299.9	302.1	34.00	6.43	26.71
324.6	327.0	34.02	6.30	26.74
349.4	352.0	34.03	6.17	26.77
375.1	378.0	34.03	6.02	26.79
399.9	403.0	34.05	5.80	26.83
424.6	427.9	34.07	5.53	26.88
449.5	453.0	34.10	5.18	26.94
475.2	479.0	34.13	4.94	26.99
499.8	503.8	34.15	4.75	27.03
534.7	539.1	34.18	4.60	27.07

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE
LAT N 48 8.50
DATE 31/ 1/79
TIME (PST) 0533

TAPE: U00454   -011
LONG W 126   .00
PASS NO. 51
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	32.52	7.98	25.33
2.0	2.0	32.52	7.97	25.33
5.0	5.1	32.51	7.99	25.32
9.9	10.0	32.52	7.99	25.33
14.9	15.0	32.53	8.04	25.33
20.2	20.3	32.53	8.04	25.33
24.9	25.0	32.53	8.03	25.33
29.8	30.0	32.53	8.03	25.33
34.8	35.0	32.53	8.03	25.33
39.8	40.1	32.53	8.04	25.33
44.7	45.0	32.60	8.17	25.37
49.8	50.1	32.73	8.36	25.44
59.7	60.0	33.12	8.33	25.75
69.7	70.2	33.23	8.34	25.83
80.5	81.0	33.39	8.26	25.98
90.4	91.0	33.44	8.26	26.02
100.4	101.0	33.55	8.19	26.11
110.0	110.7	33.71	8.04	26.26
120.2	121.0	33.79	7.95	26.33
130.0	130.9	33.84	7.77	26.40
140.1	141.0	33.85	7.73	26.41
149.9	150.9	33.87	7.69	26.44
159.8	160.9	33.88	7.66	26.45
169.9	171.0	33.91	7.59	26.48
179.8	181.1	33.92	7.56	26.49
189.8	191.1	33.93	7.49	26.51
199.7	201.0	33.95	7.40	26.54
224.6	226.2	33.98	7.15	26.59
250.2	252.0	34.00	6.90	26.64
274.9	276.9	34.01	6.72	26.68
299.6	301.8	34.01	6.51	26.71
324.7	327.1	34.03	6.34	26.74
350.3	352.9	34.04	6.18	26.77
375.1	378.0	34.05	6.02	26.80
399.9	403.0	34.05	5.77	26.83
424.7	428.0	34.06	5.62	26.86
450.4	454.0	34.08	5.35	26.91
475.1	478.9	34.09	5.23	26.93
500.0	504.0	34.11	4.99	26.98
550.3	554.9	34.16	4.72	27.04

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 15.10
DATE 31/ 1/79
TIME (PST) 0648

TAPE: U00454 -012
LONG W 125 47.70
PASS NO. 53
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	31.76	6.89	24.88
2.0	2.0	31.76	6.90	24.89
4.9	4.9	31.77	6.91	24.89
10.0	10.0	31.76	6.93	24.88
14.9	15.0	31.81	7.01	24.91
19.9	20.0	31.85	7.05	24.93
24.8	24.9	31.85	7.08	24.93
29.9	30.0	31.92	7.27	24.96
34.9	35.1	32.36	8.07	25.20
39.8	40.0	32.54	8.35	25.29
44.8	45.1	32.57	8.39	25.31
49.9	50.1	32.67	8.31	25.40
59.7	60.1	32.91	8.24	25.60
69.6	70.1	33.05	8.24	25.71
80.5	81.0	33.19	8.27	25.81
90.4	91.0	33.28	8.28	25.88
100.4	101.0	33.40	8.26	25.98
110.2	110.8	33.54	8.25	26.09
120.3	121.0	33.65	8.18	26.19
130.2	131.0	33.74	8.10	26.27
140.1	141.0	33.78	7.98	26.32
150.1	151.1	33.82	7.90	26.36
159.9	161.0	33.85	7.82	26.40
169.9	171.0	33.86	7.76	26.42
179.7	180.9	33.86	7.75	26.42
185.7	186.9	33.87	7.74	26.42

```
COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01    CODE                                 TAPE: U00454    -013
LAT  N 48 25.00                                       LONG W 125 59.80
DATE 31/ 1/79                                         PASS NO. 55
TIME (PST) 0803                                       STN: 201

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
    .2         .2      32.09       6.84     25.15
   2.1        2.1      32.09       6.83     25.15
   4.9        5.0      32.08       6.84     25.14
  10.0       10.1      32.09       6.83     25.15
  15.5       15.6      32.16       6.88     25.20
  19.9       20.1      32.27       6.92     25.28
  25.1       25.2      32.29       6.93     25.29
  29.8       30.0      32.29       6.93     25.30
  34.7       34.9      32.29       6.94     25.30
  39.6       39.9      32.37       7.04     25.34
  45.5       45.7      32.62       7.90     25.42
  49.7       50.0      32.78       8.10     25.52
  59.6       60.0      33.10       8.24     25.75
  70.2       70.7      33.27       8.10     25.90
  79.4       79.9      33.38       8.03     26.00
  89.5       90.1      33.52       7.88     26.13
  99.3       99.9      33.61       7.65     26.23
 110.0      110.7      33.69       7.74     26.29
 120.3      121.0      33.77       7.85     26.33
 130.2      131.1      33.78       7.83     26.34
 140.1      141.0      33.79       7.76     26.36
 150.7      151.7      33.80       7.71     26.38
 159.9      161.0      33.82       7.67     26.40
 169.9      171.0      33.86       7.58     26.44
 177.8      179.0      33.87       7.57     26.45
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE
LAT  N 48 31.50                              TAPE: U00454   -014
DATE 31/ 1/79                                LONG W 126  7.00
TIME (PST) 0902                              PASS NO. 57
                                             STN: 202

 DEPTH     PRESS      SAL      TEMP    SIGMA-T
    .2        .2     31.99     6.81     25.08
   2.0       2.0     31.99     6.81     25.08
   5.1       5.1     31.99     6.82     25.08
   9.9      10.0     31.99     6.81     25.08
  15.0      15.1     31.99     6.81     25.08
  19.7      19.9     32.02     6.94     25.08
  24.8      25.0     32.24     7.23     25.21
  29.7      29.9     32.35     7.37     25.29
  34.9      35.1     32.46     7.57     25.35
  39.7      40.0     32.59     7.74     25.42
  44.7      45.0     32.64     7.79     25.45
  49.6      49.9     32.70     7.80     25.50
  59.6      60.0     32.98     8.29     25.65
  69.6      70.0     33.17     8.20     25.81
  79.6      80.1     33.31     8.25     25.91
  90.4      91.0     33.43     8.08     26.03
 100.4     101.1     33.54     7.92     26.14
 110.3     111.0     33.58     7.71     26.20
 120.3     121.0     33.64     7.63     26.26
 130.7     131.5     33.66     7.56     26.29
 140.2     141.1     33.75     7.60     26.36
 150.0     151.0     33.85     7.48     26.44
 160.0     161.0     33.88     7.39     26.48
 169.9     171.1     33.93     7.15     26.56
 178.9     180.1     33.93     7.14     26.56
```

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01    CODE                                TAPE: U00454    -015
LAT  N 48 35.80                                      LONG W 126 12.70
DATE 31/ 1/79                                        PASS NO. 59
TIME (PST) 1004                                      STN: 203

  DEPTH      PRESS       SAL       TEMP     SIGMA-T
     .2         .2      32.22      7.40      25.18
    2.0        2.0      32.22      7.40      25.18
    4.9        5.0      32.22      7.40      25.17
    9.9       10.0      32.22      7.40      25.18
   15.0       15.1      32.26      7.47      25.20
   19.9       20.0      32.31      7.63      25.22
   24.8       25.0      32.32      7.65      25.22
   29.8       30.0      32.34      7.70      25.23
   34.9       35.1      32.34      7.71      25.23
   39.8       40.1      32.34      7.71      25.23
   44.7       45.0      32.35      7.71      25.23
   49.7       50.0      32.35      7.71      25.23
   59.6       60.0      32.38      7.80      25.25
   69.6       70.1      32.70      8.28      25.43
   80.5       81.0      32.90      8.38      25.57
   90.2       90.7      33.21      8.43      25.81
  100.5      101.1      33.48      8.29      26.04
  110.3      111.0      33.59      8.22      26.13
  120.2      121.0      33.66      8.11      26.20
  130.3      131.1      33.69      8.00      26.25
  140.1      141.0      33.77      7.77      26.34
  150.1      151.1      33.84      7.49      26.44
  160.8      161.8      33.91      7.50      26.49
  170.0      171.1      33.91      7.44      26.50
  179.9      181.1      33.92      7.39      26.52
  189.8      191.1      33.92      7.37      26.52
  199.6      201.0      33.96      7.21      26.57
  224.6      226.2      33.97      6.90      26.63
  250.2      252.0      34.00      6.63      26.68
  275.0      277.0      34.02      6.39      26.73
  299.9      302.1      34.02      6.21      26.75
  324.6      327.0      34.03      5.95      26.80
  350.0      352.7      34.05      5.70      26.84
  375.1      378.0      34.05      5.63      26.85
  400.0      403.1      34.06      5.49      26.88
  424.6      427.9      34.08      5.33      26.91
  450.3      453.8      34.09      5.20      26.94
  475.2      479.0      34.11      5.07      26.96
  496.0      500.0      34.14      4.87      27.01
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  01    CODE                           TAPE: U00454    -016
LAT  N 48 41.40                                  LONG W 126 19.10
DATE 31/ 1/79                                    PASS NO. 61
TIME (PST) 1103                                  STN: 204

  DEPTH       PRESS        SAL        TEMP     SIGMA-T
     .2          .2       32.34       7.55      25.25
    2.0         2.0       32.34       7.55      25.25
    5.2         5.2       32.34       7.54      25.25
    9.9        10.0       32.34       7.54      25.25
   14.7        14.8       32.34       7.55      25.25
   19.8        19.9       32.34       7.55      25.25
   24.8        24.9       32.35       7.55      25.26
   29.8        30.0       32.34       7.55      25.25
   34.9        35.1       32.34       7.54      25.25
   39.8        40.0       32.34       7.54      25.25
   44.8        45.1       32.34       7.54      25.25
   49.6        49.9       32.34       7.54      25.25
   59.6        59.9       32.41       7.77      25.28
   69.6        70.0       32.91       8.41      25.57
   80.5        81.0       33.12       8.42      25.74
   90.5        91.0       33.39       8.25      25.97
  100.4       101.0       33.45       8.18      26.03
  110.4       111.0       33.51       8.06      26.10
  120.2       121.0       33.61       7.90      26.20
  130.2       131.0       33.67       7.72      26.27
  140.1       141.0       33.72       7.54      26.34
  150.1       151.1       33.81       7.61      26.40
  160.0       161.0       33.90       7.64      26.46
  169.8       171.0       33.91       7.53      26.49
  179.7       180.9       33.92       7.40      26.51
  189.6       190.9       33.94       7.31      26.54
  199.6       201.0       33.95       7.19      26.57
  225.4       226.9       33.98       6.97      26.62
  250.3       252.1       33.99       6.72      26.66
  275.0       277.0       34.01       6.62      26.69
  299.9       302.1       34.01       6.43      26.72
  324.6       327.0       34.02       6.30      26.74
  350.4       353.0       34.03       6.10      26.77
  375.2       378.0       34.03       5.94      26.79
  399.9       403.0       34.04       5.77      26.83
  421.7       425.0       34.05       5.63      26.85
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE                                  TAPE: U00454    -017
LAT  N 48 48.00                                       LONG W 126 26.00
DATE 31/ 1/79                                         PASS NO. 63
TIME (PST) 1204                                       STN: 205

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
    .5         .5     32.21        7.46      25.16
   1.7        1.7     32.21        7.46      25.16
   4.9        4.9     32.21        7.46      25.16
  10.2       10.3     32.21        7.44      25.16
  14.9       14.9     32.20        7.49      25.15
  19.9       20.0     32.21        7.48      25.16
  24.9       25.0     32.21        7.49      25.16
  29.8       30.0     32.22        7.53      25.16
  34.8       35.0     32.24        7.58      25.17
  39.7       40.0     32.29        7.74      25.18
  44.7       45.0     32.39        8.07      25.22
  49.6       49.9     32.42        8.10      25.23
  59.7       60.0     32.58        8.28      25.34
  69.6       70.0     32.95        8.34      25.61
  79.5       80.0     33.15        8.38      25.77
  90.5       91.0     33.37        8.28      25.96
 100.4      101.0     33.50        7.99      26.10
 110.4      111.1     33.60        7.95      26.18
 120.4      121.2     33.66        7.88      26.24
 130.2      131.0     33.71        7.83      26.29
 140.0      140.9     33.79        7.71      26.37
 150.0      151.0     33.83        7.59      26.42
 159.9      161.0     33.87        7.56      26.45
 169.9      171.1     33.89        7.49      26.48
 179.8      181.1     33.90        7.42      26.50
 189.6      190.9     33.92        7.33      26.52
 199.7      201.1     33.94        7.25      26.55
 225.4      227.0     33.98        6.93      26.63
 250.3      252.1     34.00        6.54      26.70
 261.3      263.1     34.00        6.40      26.71
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 54.00
DATE 31/ 1/79
TIME (PST) 1303

TAPE: U00454 -018
LONG W 126 33.00
PASS NO. 65
STN: 206

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.96	7.09	25.01
2.0	2.0	31.96	7.09	25.01
4.9	5.0	31.96	7.09	25.01
10.1	10.1	31.96	7.10	25.01
14.9	15.0	31.96	7.07	25.02
19.9	20.0	32.08	7.23	25.09
24.9	25.0	32.11	7.28	25.11
29.7	29.9	32.31	7.65	25.21
34.9	35.1	32.37	7.67	25.26
39.8	40.0	32.38	7.68	25.26
44.7	45.0	32.38	7.68	25.26
49.7	50.0	32.38	7.70	25.26
59.6	60.0	32.62	8.06	25.40
69.6	70.1	32.89	8.28	25.58
80.4	80.9	33.40	8.25	25.98
90.0	90.5	33.45	8.20	26.03
100.4	101.0	33.52	8.09	26.10
110.3	111.0	33.67	7.88	26.25
120.3	121.1	33.74	7.78	26.32
130.5	131.3	33.75	7.66	26.34
140.0	140.9	33.78	7.71	26.36
150.1	151.1	33.82	7.72	26.39
160.0	161.0	33.83	7.69	26.40
170.0	171.1	33.84	7.66	26.41
179.9	181.1	33.84	7.62	26.42
189.7	191.0	33.85	7.58	26.44
199.7	201.1	33.88	7.45	26.47
225.5	227.1	33.90	7.34	26.51
249.1	250.9	33.99	6.79	26.65

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 1.30
DATE 31/ 1/79
TIME (PST) 1402

TAPE: U00454 -019
LONG W 126 41.80
PASS NO. 67
STN: 207

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.6	.6	32.06	7.18	25.08
2.0	2.0	32.06	7.18	25.09
4.9	4.9	32.07	7.17	25.09
10.6	10.6	32.07	7.17	25.09
14.8	14.9	32.07	7.17	25.09
19.8	19.9	32.08	7.17	25.10
24.8	24.9	32.16	7.40	25.13
29.8	30.0	32.23	7.49	25.17
34.9	35.1	32.31	7.57	25.23
39.8	40.1	32.32	7.55	25.24
44.8	45.0	32.34	7.58	25.25
49.7	50.0	32.35	7.60	25.25
59.7	60.1	32.43	7.81	25.28
70.5	70.9	32.75	8.16	25.48
80.6	81.0	33.06	8.29	25.71
90.5	91.0	33.36	8.37	25.94
99.5	100.1	33.53	8.12	26.11
110.3	111.0	33.61	7.97	26.19
119.3	120.0	33.66	7.95	26.23
130.1	131.0	33.74	8.03	26.29
140.0	140.9	33.80	7.94	26.34
150.0	151.0	33.85	7.86	26.40
159.9	161.0	33.86	7.66	26.43
169.8	171.0	33.88	7.51	26.47
179.7	180.9	33.90	7.46	26.49
189.8	191.0	33.92	7.39	26.51
199.4	200.7	33.95	7.21	26.56

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 7.30
DATE 31/ 1/79
TIME (PST) 1503

TAPE: U00454 -020
LONG W 126 48.90
PASS NO. 69
STN: 208

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	32.27	7.36	25.22
4.9	4.9	32.27	7.36	25.22
9.7	9.8	32.28	7.34	25.23
15.0	15.0	32.27	7.34	25.23
19.8	19.9	32.28	7.34	25.23
24.9	25.0	32.28	7.34	25.23
29.8	30.0	32.45	7.74	25.31
34.7	34.9	32.68	8.03	25.45
39.9	40.2	32.82	8.00	25.56
44.6	44.9	32.86	8.08	25.58
49.7	50.0	32.94	8.17	25.63
59.6	60.0	33.14	8.35	25.76
69.7	70.1	33.25	8.17	25.87
79.6	80.1	33.40	7.97	26.03
90.5	91.1	33.56	7.84	26.17
100.4	101.1	33.63	7.78	26.23
110.2	110.9	33.66	7.75	26.26
120.4	121.1	33.73	7.71	26.32
130.0	130.9	33.75	7.68	26.34
140.0	141.0	33.83	7.51	26.43
150.1	151.1	33.89	7.40	26.49
153.5	154.6	33.89	7.40	26.49

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE                               TAPE: U00454    -021
LAT  N 49 13.70                                    LONG W 126 57.10
DATE 31/ 1/79                                      PASS NO. 71
TIME (PST) 1601                                    STN: 209

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .2         .2     32.18       6.96     25.20
   2.0        2.1     32.18       6.96     25.20
   5.0        5.0     32.18       6.96     25.20
  10.0       10.0     32.18       6.91     25.21
  14.8       14.9     32.18       6.91     25.22
  20.0       20.1     32.19       6.91     25.22
  24.9       25.0     32.19       6.91     25.22
  29.8       30.0     32.23       6.94     25.25
  34.7       34.9     32.26       6.96     25.26
  39.8       40.0     32.33       7.18     25.29
  44.7       44.9     32.56       7.38     25.45
  49.7       50.0     32.88       7.79     25.65
  59.7       60.1     33.15       8.16     25.80
  69.6       70.0     33.35       8.11     25.96
  80.5       81.0     33.46       8.00     26.07
  90.5       91.0     33.60       7.99     26.18
 100.4      101.0     33.69       7.95     26.25
 110.3      111.1     33.77       7.78     26.34
 120.1      120.9     33.83       7.66     26.40
 130.2      131.1     33.85       7.62     26.43
 140.0      141.0     33.87       7.58     26.45
 150.0      151.0     33.90       7.46     26.49
 150.9      151.9     33.90       7.45     26.49
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE
LAT N 49 21.53
DATE 31/ 1/79
TIME (PST) 1701

TAPE: U00454   -022
LONG W 127 5.60
PASS NO. 73
STN: 210

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	32.29	7.04	25.28
2.0	2.0	32.28	7.03	25.27
5.0	5.1	32.28	7.04	25.27
10.1	10.1	32.29	7.04	25.28
15.0	15.1	32.29	7.05	25.28
19.9	20.0	32.30	7.07	25.29
24.9	25.0	32.31	7.07	25.29
29.7	29.9	32.32	7.11	25.29
34.7	34.9	32.34	7.18	25.30
39.9	40.1	32.39	7.30	25.32
44.7	44.9	32.44	7.44	25.34
49.6	49.9	32.47	7.47	25.37
59.6	60.0	32.52	7.52	25.40
69.6	70.0	32.66	7.66	25.49
80.5	81.0	33.03	7.95	25.74
90.5	91.0	33.11	7.87	25.81
99.4	100.0	33.35	7.95	25.99
110.3	110.9	33.60	7.79	26.21
120.3	121.0	33.72	7.73	26.31
130.0	130.9	33.81	7.56	26.41
140.0	140.9	33.86	7.48	26.45
143.1	144.0	33.87	7.45	26.47

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE   TAPE: U00454   -023
LAT N 49 28.37   LONG W 127 13.72
DATE 31/ 1/79   PASS NO. 75
TIME (PST) 1759   STN: 211

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	32.22	7.26	25.20
2.0	2.0	32.25	7.26	25.22
4.9	5.0	32.25	7.26	25.22
10.0	10.1	32.26	7.26	25.23
14.9	15.0	32.29	7.30	25.25
19.9	20.0	32.31	7.30	25.26
24.9	25.0	32.31	7.30	25.26
29.8	30.0	32.31	7.30	25.27
34.8	35.0	32.32	7.33	25.27
39.8	40.0	32.38	7.51	25.29
44.6	44.8	32.41	7.63	25.30
50.0	50.3	32.61	7.94	25.41
59.6	60.0	32.75	7.83	25.53
69.7	70.1	32.90	7.87	25.65
79.5	80.0	33.14	7.94	25.82
90.4	91.0	33.37	8.11	25.98
100.5	101.1	33.54	7.98	26.13
110.2	110.9	33.68	7.90	26.25
120.2	121.0	33.76	7.87	26.32
130.1	130.9	33.81	7.73	26.38
140.2	141.1	33.82	7.66	26.40
150.1	151.1	33.87	7.51	26.46
156.8	157.9	33.87	7.49	26.46

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01    CODE
LAT  N 49 33.64                                  TAPE: U00454    -024
DATE 31/ 1/79                                    LONG W 127 20.38
TIME (PST) 1901                                  PASS NO. 77
                                                 STN: 212

  DEPTH      PRESS       SAL        TEMP     SIGMA-T
     .3         .3     32.05        6.47      25.17
    2.0        2.0     32.05        6.47      25.16
    5.0        5.0     32.05        6.47      25.16
   10.1       10.1     32.05        6.47      25.16
   14.8       14.9     32.05        6.49      25.17
   19.9       20.0     32.11        6.60      25.20
   24.9       25.0     32.24        7.01      25.24
   29.6       29.8     32.37        7.21      25.32
   34.8       35.0     32.38        7.22      25.32
   39.8       40.0     32.38        7.21      25.33
   44.9       45.1     32.39        7.22      25.34
   49.8       50.1     32.42        7.27      25.36
   60.0       60.3     32.73        7.61      25.55
   69.7       70.1     33.01        8.01      25.71
   79.5       80.0     33.27        8.13      25.90
   90.5       91.0     33.52        8.17      26.09
   99.3      100.0     33.53        7.94      26.13
  109.8      110.5     33.64        7.92      26.22
  119.2      120.0     33.69        7.92      26.26
  130.1      130.9     33.76        7.85      26.33
  140.1      141.0     33.82        7.75      26.39
  150.0      151.0     33.87        7.57      26.45
  160.0      161.1     33.89        7.58      26.46
  169.8      171.0     33.90        7.50      26.49
  179.8      181.1     33.90        7.45      26.49
  189.7      191.0     33.93        7.31      26.54
  199.4      200.7     33.95        7.19      26.56
  225.2      226.8     33.97        7.06      26.60
  225.2      226.8     33.97        7.06      26.60
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 38.80
DATE 31/ 1/79
TIME (PST) 2002

TAPE: U00454 -025
LONG W 127 27.00
PASS NO. 79
STN: 213

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	32.18	7.00	25.20
2.1	2.1	32.18	6.99	25.20
5.0	5.0	32.17	6.99	25.20
9.9	9.9	32.18	7.00	25.20
15.0	15.1	32.17	7.00	25.20
19.8	19.9	32.17	7.01	25.19
24.8	25.0	32.18	7.04	25.19
29.9	30.0	32.18	7.04	25.19
34.8	35.0	32.21	7.13	25.20
39.9	40.1	32.26	7.30	25.22
44.8	45.0	32.35	7.39	25.28
49.8	50.1	32.39	7.48	25.30
59.7	60.0	32.54	7.54	25.41
70.5	70.9	32.70	7.66	25.52
79.6	80.1	33.06	8.17	25.73
90.4	90.9	33.39	8.07	26.00
100.4	101.0	33.54	8.06	26.12
110.3	111.0	33.67	7.95	26.24
120.3	121.0	33.74	7.84	26.31
130.1	130.9	33.79	7.79	26.36
140.1	141.0	33.85	7.72	26.41
150.0	151.0	33.87	7.61	26.45
160.0	161.0	33.91	7.53	26.48
169.9	171.0	33.92	7.46	26.51
179.8	181.1	33.94	7.35	26.54
189.6	190.9	33.95	7.33	26.55
200.4	201.7	33.96	7.19	26.58
225.4	227.0	33.96	7.15	26.58
250.3	252.0	33.98	7.02	26.61
275.0	277.0	33.99	6.66	26.67
299.9	302.1	34.00	6.48	26.70
324.7	327.1	33.99	6.41	26.71
350.6	353.2	33.99	6.29	26.72
375.3	378.1	34.01	6.31	26.73
399.9	403.0	34.00	6.06	26.76
401.9	405.0	33.97	6.04	26.73

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  01    CODE                               TAPE: U00454   -026
LAT  N 49 42.70                                      LONG W 127 32.10
DATE 31/ 1/79                                        PASS NO. 81
TIME (PST) 2102                                      STN: 214

  DEPTH       PRESS       SAL        TEMP     SIGMA-T
     .6          .6      32.27       7.09      25.26
    2.0         2.0      32.26       7.09      25.25
    5.0         5.1      32.26       7.09      25.25
   10.1        10.1      32.26       7.09      25.25
   15.0        15.1      32.26       7.10      25.25
   20.0        20.1      32.27       7.10      25.25
   24.8        24.9      32.27       7.11      25.25
   29.8        30.0      32.27       7.15      25.25
   34.8        35.0      32.28       7.16      25.26
   39.8        40.0      32.37       7.34      25.30
   44.7        45.0      32.37       7.34      25.31
   49.8        50.1      32.38       7.36      25.31
   59.7        60.1      32.49       7.49      25.38
   69.3        69.7      32.72       7.91      25.50
   80.3        80.8      32.82       8.00      25.56
   89.5        90.1      33.36       8.28      25.95
  100.5       101.1      33.51       8.13      26.09
  110.4       111.1      33.64       8.04      26.20
  120.4       121.1      33.75       7.93      26.31
  130.1       131.0      33.81       7.81      26.37
  140.1       141.1      33.87       7.63      26.44
  150.0       151.0      33.88       7.54      26.47
  160.0       161.0      33.89       7.49      26.48
  169.9       171.1      33.90       7.43      26.50
  179.9       181.1      33.93       7.26      26.54
  189.7       191.0      33.94       7.18      26.56
  199.5       200.9      33.96       7.13      26.59
  225.4       227.0      33.98       6.86      26.64
  250.2       252.0      33.98       6.75      26.65
  275.1       277.1      34.00       6.58      26.69
  299.9       302.1      34.00       6.36      26.72
  324.6       327.0      33.97       5.87      26.75
  350.3       352.9      33.96       5.45      26.80
  375.2       378.0      34.02       5.68      26.82
  399.9       403.0      34.03       5.64      26.83
  424.6       427.9      34.04       5.56      26.85
  449.6       453.1      34.07       5.35      26.90
  475.1       478.9      34.09       5.14      26.94
  490.7       494.6      34.10       5.04      26.96
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01    CODE                              TAPE: U00454    -027
LAT  N 49 47.60                                    LONG W 127 36.90
DATE 31/ 1/79                                      PASS NO. 83
TIME (PST) 2205                                    STN: 215

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .3         .3     32.30       7.10     25.28
   1.9        1.9     32.29       7.07     25.28
   5.0        5.0     32.30       7.08     25.28
   9.7        9.8     32.31       7.08     25.29
  14.9       15.0     32.32       7.12     25.30
  19.9       20.1     32.34       7.19     25.30
  24.9       25.0     32.35       7.21     25.31
  29.8       30.0     32.38       7.23     25.32
  34.7       34.9     32.41       7.28     25.34
  39.7       40.0     32.46       7.35     25.37
  44.7       45.0     32.46       7.37     25.37
  49.7       50.0     32.48       7.39     25.38
  59.7       60.0     32.63       7.60     25.48
  69.6       70.0     32.70       7.61     25.53
  80.5       80.9     33.12       7.98     25.80
  90.4       91.0     33.20       7.89     25.88
 100.3      101.0     33.39       7.96     26.02
 110.2      110.9     33.51       7.85     26.13
 120.1      120.9     33.88       7.44     26.48
 130.2      131.1     33.93       7.24     26.54
 134.1      134.9     33.93       7.23     26.55
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 53.20
DATE 31/ 1/79
TIME (PST) 2313

TAPE: U00454 -028
LONG W 127 41.40
PASS NO. 85
STN: 216

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	32.35	7.06	25.32
5.0	5.0	32.36	7.07	25.33
9.9	10.0	32.35	7.07	25.32
14.9	15.0	32.34	7.07	25.32
19.9	20.0	32.35	7.07	25.32
24.9	25.0	32.35	7.09	25.32
29.8	30.0	32.35	7.09	25.32
34.7	34.9	32.37	7.15	25.33
39.6	39.8	32.46	7.39	25.37
44.7	45.0	32.63	7.56	25.48
49.7	50.0	32.68	7.60	25.51
59.7	60.0	33.09	7.92	25.79
69.5	70.0	33.29	7.94	25.94
79.7	80.2	33.48	7.65	26.14
90.4	91.0	33.54	7.59	26.19
100.4	101.0	33.59	7.60	26.22
110.3	111.0	33.71	7.53	26.33
120.3	121.0	33.78	7.37	26.41
130.1	131.0	33.82	7.25	26.46
140.1	141.0	33.94	7.31	26.54
150.1	151.1	33.94	7.16	26.57
159.6	160.7	33.96	7.01	26.60
169.8	171.0	33.95	6.83	26.62
179.8	181.0	33.96	6.80	26.63
189.7	191.1	33.96	6.70	26.64
199.6	201.0	33.97	6.61	26.66
225.4	227.0	33.98	6.38	26.70
250.2	252.1	33.99	6.18	26.73
258.2	260.1	33.99	6.13	26.74

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 59.10
DATE 1/ 2/79
TIME (PST) 0005

TAPE: U00454 -029
LONG W 127 48.40
PASS NO. 87
STN: 217

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	31.62	6.06	24.88
3.0	3.0	31.62	6.06	24.88
5.0	5.0	31.62	6.06	24.88
9.9	10.0	31.62	6.06	24.88
14.9	15.0	31.63	6.07	24.88
20.0	20.1	31.84	6.31	25.02
25.0	25.1	32.21	6.86	25.24
29.8	30.0	32.33	7.05	25.31
34.8	35.0	32.40	7.17	25.35
39.7	40.0	32.45	7.34	25.37
44.7	45.0	32.52	7.40	25.42
49.6	49.9	32.56	7.45	25.44
59.6	59.9	33.12	7.72	25.84
70.6	71.0	33.46	7.69	26.11
79.6	80.1	33.53	7.60	26.18
90.4	91.0	33.59	7.53	26.24
100.4	101.0	33.66	7.62	26.28
110.1	110.8	33.76	7.47	26.38
120.2	121.0	33.80	7.42	26.42
130.1	131.0	33.83	7.37	26.45
140.2	141.1	33.84	7.31	26.46
150.1	151.1	33.87	7.24	26.49
159.9	161.0	33.88	7.15	26.52
169.9	171.0	33.90	6.96	26.56
179.7	180.9	33.94	6.75	26.62
189.7	191.0	33.95	6.63	26.65
199.6	201.0	33.96	6.58	26.65
225.5	227.1	33.97	6.46	26.68
250.1	251.9	33.98	6.34	26.70
274.9	276.9	33.98	6.24	26.72
299.7	302.0	34.01	5.75	26.80
324.6	327.1	34.02	5.58	26.83
350.5	353.1	34.03	5.48	26.85
375.1	378.0	34.04	5.38	26.87
399.9	403.0	34.04	5.34	26.88
424.6	428.0	34.07	5.15	26.92
450.3	453.9	34.11	4.85	26.99
475.2	479.1	34.11	4.83	26.99
499.9	503.9	34.13	4.69	27.02
502.8	506.9	34.13	4.70	27.02

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 50 5.20
DATE 1/ 2/79
TIME (PST) 0121

TAPE: U00454 -030
LONG W 127 56.90
PASS NO. 89
STN: 218

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	31.55	5.87	24.85
1.9	1.9	31.55	5.86	24.85
4.9	4.9	31.55	5.85	24.85
10.0	10.1	31.55	5.87	24.84
15.0	15.1	31.74	6.17	24.96
19.9	20.0	31.75	6.19	24.96
24.7	24.9	31.90	6.56	25.04
29.7	29.9	31.94	6.60	25.06
34.8	35.0	31.95	6.63	25.07
39.7	40.0	31.96	6.63	25.08
44.8	45.1	31.97	6.64	25.08
49.8	50.0	32.05	6.75	25.13
59.6	59.9	32.37	7.13	25.33
69.6	70.0	32.83	7.39	25.66
79.5	79.9	33.58	7.37	26.25
85.4	85.9	33.61	7.37	26.28

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 50 1.00
DATE 1/ 2/79
TIME (PST) 0216

TAPE: U00454 -031
LONG W 128 6.00
PASS NO. 91
STN: 301

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.74	6.11	24.96
1.9	1.9	31.74	6.11	24.96
5.0	5.1	31.74	6.11	24.97
10.0	10.0	31.75	6.11	24.97
15.0	15.0	31.75	6.11	24.97
20.0	20.1	31.76	6.12	24.98
24.8	25.0	32.16	6.85	25.20
29.8	30.0	32.37	7.22	25.32
34.8	35.0	32.40	7.33	25.33
39.8	40.1	32.50	7.44	25.39
44.7	45.0	32.58	7.39	25.46
48.7	49.0	32.62	7.41	25.49
60.6	61.0	32.96	7.72	25.72
69.5	69.9	33.19	7.84	25.88
79.6	80.1	33.49	7.95	26.09
90.4	91.0	33.54	7.82	26.16
100.2	100.8	33.60	7.81	26.20
110.4	111.1	33.69	7.80	26.27
120.2	121.0	33.73	7.69	26.32
130.0	130.8	33.75	7.50	26.37
140.0	140.9	33.80	7.50	26.41
150.1	151.1	33.83	7.41	26.44
160.1	161.2	33.85	7.39	26.46
170.0	171.1	33.87	7.40	26.47
180.0	181.3	33.89	7.37	26.50
189.6	190.9	33.90	7.29	26.52
199.6	201.0	33.91	7.19	26.54
225.4	227.0	33.94	6.92	26.60
250.2	252.0	33.95	6.79	26.63
275.1	277.1	33.97	6.59	26.66
299.7	301.9	33.98	6.40	26.69
325.4	327.9	33.99	6.27	26.72
350.3	352.9	34.00	6.11	26.75
375.2	378.1	34.01	6.01	26.77
400.0	403.1	34.02	5.82	26.80
424.7	428.1	34.04	5.61	26.85
450.3	453.9	34.05	5.42	26.88
475.2	479.0	34.06	5.27	26.90
499.9	503.9	34.08	5.07	26.94
501.8	505.8	34.08	5.06	26.94

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  01   CODE
LAT  N 49 56.50                               TAPE: U00454   -032
DATE  1/ 2/79                                 LONG W 128 12.00
TIME (PST) 0324                               PASS NO. 93
                                              STN: 302

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
    .2         .2      32.19       6.70      25.25
   2.1        2.1      32.19       6.70      25.25
   5.0        5.0      32.19       6.70      25.25
  10.0       10.0      32.19       6.71      25.25
  14.9       15.0      32.20       6.71      25.25
  19.9       20.0      32.21       6.74      25.26
  24.9       25.0      32.26       6.92      25.27
  29.8       29.9      32.47       7.26      25.40
  34.8       35.0      32.67       7.44      25.53
  39.9       40.2      32.81       7.52      25.62
  44.8       45.0      32.94       7.68      25.70
  49.7       50.0      33.13       7.82      25.84
  59.5       59.9      33.41       7.84      26.05
  69.8       70.2      33.55       7.77      26.17
  79.5       80.0      33.69       7.61      26.30
  90.4       91.0      33.77       7.50      26.38
 100.4      101.0      33.80       7.48      26.41
 110.3      111.0      33.81       7.42      26.43
 120.2      121.0      33.83       7.39      26.45
 130.1      131.0      33.86       7.38      26.47
 140.1      141.0      33.87       7.32      26.49
 150.0      151.0      33.89       7.25      26.51
 159.9      161.0      33.91       7.21      26.53
 169.8      171.0      33.91       7.18      26.54
 179.8      181.1      33.93       7.13      26.56
 189.6      190.9      33.93       7.11      26.56
 199.5      200.9      33.93       7.07      26.57
 225.6      227.2      33.95       6.96      26.60
 250.2      252.1      33.96       6.83      26.63
 275.0      277.0      33.98       6.70      26.65
 299.9      302.1      33.99       6.51      26.69
 325.4      327.9      34.00       6.36      26.72
 350.3      353.0      34.01       6.21      26.75
 375.1      378.0      34.01       6.00      26.77
 399.9      403.0      34.02       5.76      26.81
 424.4      427.7      34.03       5.65      26.83
 450.5      454.1      34.05       5.46      26.87
 475.3      479.1      34.07       5.32      26.90
 499.9      504.0      34.08       5.16      26.93
 503.0      507.1      34.08       5.15      26.93
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 47.00
DATE 1/ 2/79
TIME (PST) 0501

TAPE: U00454 -033
LONG W 128 28.00
PASS NO. 95
STN: 303

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	32.40	6.93	25.39
2.1	2.1	32.43	6.93	25.41
4.9	4.9	32.43	6.94	25.41
9.9	10.0	32.43	6.94	25.41
14.8	14.9	32.44	6.97	25.41
19.9	20.0	32.45	6.98	25.42
24.9	25.0	32.46	7.01	25.42
29.8	30.0	32.47	7.06	25.42
34.9	35.1	32.47	7.06	25.42
39.9	40.2	32.47	7.07	25.42
44.7	45.0	32.48	7.08	25.43
49.7	50.0	32.53	7.19	25.45
59.6	60.0	32.95	7.70	25.71
69.5	70.0	33.25	7.61	25.96
80.5	81.0	33.44	7.65	26.10
89.5	90.1	33.52	7.63	26.16
100.3	100.9	33.66	7.85	26.25
110.8	111.5	33.75	7.85	26.32
120.3	121.1	33.84	7.79	26.39
130.1	131.0	33.86	7.72	26.42
140.2	141.1	33.89	7.63	26.45
149.9	151.0	33.90	7.55	26.48
159.9	160.9	33.91	7.46	26.50
170.0	171.2	33.93	7.31	26.53
179.9	181.1	33.93	7.21	26.55
189.7	191.0	33.94	7.19	26.56
199.6	201.0	33.96	7.14	26.58
225.3	226.9	33.98	6.92	26.62
249.3	251.1	33.98	6.66	26.67
275.0	277.0	33.99	6.43	26.70
299.8	302.0	34.01	6.17	26.75
324.6	327.0	34.01	5.87	26.79
350.3	353.0	34.03	5.63	26.83
375.1	378.0	34.04	5.43	26.87
399.9	403.0	34.06	5.35	26.89
424.6	428.0	34.07	5.19	26.92
450.5	454.1	34.08	5.04	26.95
475.1	478.9	34.09	4.90	26.97
499.9	503.9	34.10	4.80	26.99
546.3	550.8	34.13	4.76	27.02

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  01   CODE
LAT  N 49 38.00                          TAPE: U00454   -034
DATE  1/ 2/79                            LONG W 128 40.00
TIME (PST) 0627                          PASS NO. 97
                                         STN: 304

 DEPTH     PRESS      SAL      TEMP    SIGMA-T
    .2        .2     32.49     7.27     25.41
   2.0       2.0     32.49     7.27     25.41
   5.0       5.0     32.49     7.28     25.41
   9.9      10.0     32.49     7.28     25.41
  15.0      15.1     32.49     7.28     25.41
  19.8      19.9     32.49     7.28     25.41
  24.8      25.0     32.49     7.27     25.41
  30.2      30.3     32.49     7.28     25.41
  34.7      34.9     32.49     7.29     25.41
  39.8      40.0     32.49     7.30     25.41
  44.7      45.0     32.49     7.30     25.41
  49.6      49.9     32.49     7.30     25.41
  59.8      60.1     32.49     7.30     25.40
  69.6      70.0     32.82     7.56     25.63
  80.3      80.8     33.25     7.78     25.93
  90.4      90.9     33.39     7.51     26.08
 100.3     101.0     33.51     7.51     26.18
 110.1     110.8     33.65     7.57     26.28
 120.3     121.1     33.66     7.36     26.32
 130.0     130.9     33.69     7.27     26.36
 140.1     141.1     33.78     7.26     26.42
 150.0     151.0     33.84     7.25     26.47
 159.8     160.9     33.86     7.17     26.50
 169.7     170.9     33.89     7.05     26.54
 179.9     181.1     33.91     6.95     26.57
 189.6     190.9     33.92     6.87     26.59
 199.6     201.0     33.93     6.77     26.61
 225.4     227.0     33.95     6.61     26.65
 250.1     251.9     33.95     6.30     26.69
 275.0     277.0     33.96     6.06     26.72
 299.7     301.9     33.99     5.87     26.77
 324.6     327.0     33.96     5.49     26.80
 350.3     353.0     33.98     5.32     26.83
 375.1     378.0     33.99     5.11     26.86
 400.0     403.1     33.99     4.97     26.88
 424.7     428.0     34.02     4.87     26.91
 450.2     453.8     34.03     4.73     26.94
 475.2     479.1     34.05     4.69     26.96
 499.9     504.0     34.09     4.80     26.98
 541.4     545.9     34.09     4.38     27.03
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 21.00
DATE 1/ 2/79
TIME (PST) 0844

TAPE: U00454 -035
LONG W 128 19.00
PASS NO. 99
STN: 305

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.9	1.0	32.59	7.86	25.40
2.0	2.0	32.59	7.85	25.40
5.0	5.0	32.59	7.86	25.40
10.0	10.0	32.59	7.86	25.40
15.0	15.1	32.59	7.86	25.40
20.0	20.1	32.59	7.86	25.41
24.8	25.0	32.59	7.86	25.40
29.8	30.0	32.59	7.86	25.40
34.8	35.0	32.59	7.87	25.40
39.7	40.0	32.59	7.87	25.40
44.8	45.1	32.59	7.87	25.40
49.4	49.7	32.59	7.87	25.40
59.5	59.9	32.59	7.87	25.40
69.6	70.0	32.59	7.87	25.40
80.5	80.9	32.59	7.87	25.40
90.4	91.0	32.99	7.59	25.76
100.4	101.0	33.17	7.45	25.91
110.2	110.9	33.38	7.28	26.11
120.2	121.0	33.51	7.05	26.24
130.1	130.9	33.66	7.15	26.34
140.1	141.0	33.77	7.09	26.44
150.0	151.0	33.83	7.08	26.49
159.9	161.0	33.86	7.02	26.52
169.9	171.1	33.89	6.94	26.55
179.7	180.9	33.91	6.88	26.58
189.6	190.9	33.93	6.87	26.60
199.7	201.0	33.96	6.82	26.63
225.4	227.0	33.98	6.53	26.68
250.3	252.1	33.95	6.22	26.69
275.0	277.0	33.97	6.02	26.74
299.7	302.0	33.98	5.89	26.77
324.6	327.0	34.00	5.73	26.80
350.4	353.1	34.02	5.59	26.83
375.2	378.1	34.04	5.42	26.87
399.8	402.9	34.05	5.30	26.89
424.8	428.1	34.06	5.08	26.92
450.3	453.9	34.08	4.97	26.95
474.9	478.7	34.10	4.86	26.98
499.9	504.0	34.12	4.72	27.01
539.7	544.1	34.14	4.55	27.04

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 49 5.00
DATE 1/ 2/79
TIME (PST) 1100

TAPE: U00454 -036
LONG W 127 58.00
PASS NO.101
STN: 306

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	32.62	8.02	25.40
2.1	2.1	32.62	8.02	25.40
5.0	5.1	32.62	8.02	25.40
10.1	10.2	32.62	8.03	25.40
15.1	15.1	32.62	8.03	25.40
19.9	20.0	32.62	8.03	25.40
24.9	25.1	32.62	8.03	25.40
30.0	30.1	32.62	8.03	25.40
34.8	35.0	32.62	8.03	25.40
39.8	40.1	32.62	8.03	25.40
44.8	45.0	32.62	8.03	25.40
49.6	49.9	32.62	8.03	25.40
59.6	59.9	32.62	8.03	25.40
69.5	70.0	32.62	8.04	25.40
80.3	80.8	32.62	8.04	25.40
90.5	91.0	32.62	8.04	25.40
100.3	100.9	32.99	7.72	25.74
110.3	111.0	33.14	7.31	25.92
120.3	121.0	33.26	7.17	26.02
130.2	131.0	33.39	7.18	26.12
140.1	141.0	33.50	7.02	26.24
150.0	151.0	33.60	7.01	26.31
159.9	161.0	33.65	6.96	26.36
170.0	171.1	33.76	6.99	26.45
179.9	181.1	33.80	6.92	26.49
189.7	191.0	33.84	6.83	26.53
199.6	201.0	33.87	6.70	26.57
225.4	227.0	33.90	6.38	26.64
250.2	252.0	33.91	6.07	26.68
275.1	277.1	33.92	5.65	26.74
299.8	302.0	33.92	5.45	26.77
324.7	327.1	33.92	5.28	26.79
350.4	3[illegible].1	33.94	5.02	26.83
375.0	377.9	33.96	4.87	26.87
399.9	403.0	33.99	4.79	26.90
424.7	428.0	34.04	4.90	26.93
450.5	454.1	34.04	4.63	26.96
475.2	479.0	34.07	4.56	26.99
500.0	504.0	34.09	4.53	27.01
542.3	546.7	34.12	4.41	27.05

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 48.00
DATE 1/ 2/79
TIME (PST) 1258

TAPE: U00454 -037
LONG W 127 37.00
PASS NO.103
STN: 307

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	32.49	7.15	25.43
1.9	1.9	32.50	7.15	25.43
5.0	5.0	32.50	7.15	25.43
9.9	9.9	32.49	7.15	25.43
14.8	14.9	32.49	7.14	25.43
19.9	20.0	32.50	7.16	25.43
24.7	24.9	32.50	7.15	25.43
29.9	30.1	32.50	7.16	25.43
34.8	35.0	32.49	7.16	25.43
39.6	39.8	32.50	7.16	25.43
44.7	45.0	32.50	7.16	25.43
49.8	50.1	32.50	7.16	25.43
59.5	59.9	32.50	7.17	25.43
69.6	70.0	32.75	7.48	25.58
79.4	79.9	33.19	7.61	25.91
90.4	91.0	33.43	7.58	26.10
100.6	101.3	33.59	7.53	26.24
110.4	111.1	33.68	7.47	26.31
120.2	121.0	33.74	7.43	26.37
130.1	130.9	33.82	7.52	26.42
140.0	141.0	33.87	7.54	26.46
150.0	151.0	33.90	7.49	26.48
159.9	161.0	33.91	7.45	26.50
169.8	171.0	33.92	7.33	26.52
179.9	181.1	33.93	7.29	26.54
189.7	191.0	33.93	7.24	26.55
199.7	201.1	33.94	7.14	26.57
225.5	227.1	33.95	6.89	26.61
250.2	252.0	33.97	6.70	26.65
275.0	277.0	33.98	6.58	26.67
300.3	302.6	33.98	6.46	26.69
324.5	327.0	34.00	6.26	26.73
350.4	353.1	34.00	6.11	26.75
375.2	378.1	34.01	5.97	26.78
399.8	402.9	34.01	5.60	26.82
424.6	427.9	34.02	5.43	26.85
450.4	454.0	34.04	5.32	26.88
475.2	479.0	34.08	5.23	26.92
499.9	504.0	34.10	5.10	26.95
522.7	526.9	34.11	4.94	26.98

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 58.00
DATE 1/ 2/79
TIME (PST) 1453

TAPE: U00454 -038
LONG W 127 20.00
PASS NO.105
STN: 309

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	32.49	7.51	25.37
1.9	1.9	32.49	7.52	25.37
4.9	5.0	32.49	7.52	25.37
10.1	10.1	32.50	7.55	25.37
14.9	15.0	32.50	7.54	25.38
19.9	20.0	32.50	7.56	25.37
24.9	25.0	32.50	7.59	25.37
29.8	30.0	32.51	7.60	25.38
34.9	35.1	32.51	7.60	25.38
39.8	40.0	32.51	7.60	25.38
44.7	45.0	32.51	7.59	25.38
49.6	49.9	32.51	7.62	25.37
59.4	59.7	32.52	7.63	25.38
69.6	70.0	32.52	7.65	25.38
80.5	81.0	32.60	7.70	25.43
89.5	90.1	32.96	7.54	25.74
99.6	100.2	33.15	7.25	25.93
110.4	111.1	33.25	7.24	26.01
120.2	121.0	33.38	7.13	26.13
130.2	131.0	33.47	7.06	26.21
140.1	141.0	33.62	6.97	26.34
150.0	151.0	33.73	6.88	26.44
159.9	161.0	33.78	6.79	26.49
169.8	171.0	33.83	6.78	26.53
179.8	181.1	33.84	6.72	26.55
189.5	190.8	33.87	6.68	26.57
199.7	201.0	33.90	6.60	26.60
225.5	227.1	33.91	6.30	26.66
250.3	252.1	33.92	6.07	26.69
275.0	277.0	33.92	5.77	26.73
299.8	302.0	33.92	5.48	26.76
324.6	327.0	33.91	5.28	26.78
350.4	353.0	33.92	5.02	26.82
375.1	378.0	33.94	4.82	26.85
399.8	402.9	33.96	4.82	26.88
424.4	427.7	34.00	4.71	26.91
449.6	453.1	34.01	4.57	26.94
475.2	479.0	34.04	4.51	26.97
499.9	503.9	34.07	4.51	26.99
513.5	517.7	34.08	4.49	27.00

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE
LAT N 49 6.00
DATE 1/ 2/79
TIME (PST) 1620

TAPE: U00454   -039
LONG W 127 8.00
PASS NO.107
STN: 311

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.0	1.0	32.21	7.06	25.22
2.0	2.0	32.21	7.06	25.21
5.0	5.1	32.21	7.04	25.21
9.9	10.0	32.21	7.02	25.22
14.9	15.0	32.22	7.03	25.22
20.0	20.1	32.22	7.03	25.23
24.8	25.0	32.23	7.04	25.23
29.7	29.9	32.23	7.03	25.23
35.0	35.2	32.23	7.03	25.24
39.8	40.0	32.25	7.05	25.25
44.8	45.0	32.40	7.59	25.29
49.8	50.1	32.46	7.63	25.33
59.6	59.9	32.71	7.71	25.52
69.7	70.1	33.15	7.94	25.83
79.5	80.0	33.43	8.22	26.01
90.5	91.0	33.54	8.08	26.12
100.3	101.0	33.67	7.99	26.23
110.4	111.1	33.73	7.91	26.29
120.3	121.0	33.80	7.78	26.36
130.2	131.0	33.84	7.71	26.41
140.1	141.0	33.86	7.62	26.44
150.1	151.1	33.88	7.51	26.47
160.0	161.0	33.90	7.47	26.49
169.9	171.0	33.93	7.39	26.53
179.7	180.9	33.95	7.29	26.55
189.7	191.0	33.95	7.25	26.56
199.6	201.0	33.96	7.18	26.57
225.4	227.0	33.98	7.00	26.61
250.2	252.0	33.99	6.68	26.67
274.9	276.9	33.98	6.32	26.71
299.6	301.8	33.95	5.91	26.73
325.5	327.9	33.96	5.70	26.77
350.4	353.0	33.99	5.61	26.80
375.1	378.0	33.95	5.05	26.84
399.9	403.0	33.96	4.96	26.86
424.7	428.0	34.00	5.05	26.88
450.5	454.1	34.07	5.25	26.91
475.1	479.0	34.09	5.17	26.94
500.0	504.0	34.10	5.03	26.96
550.4	554.9	34.13	4.79	27.01

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  01   CODE
LAT  N 49 14.00                                      TAPE: U00454   -040
DATE  1/ 2/79                                        LONG W 126 55.00
TIME (PST) 1744                                      PASS NO.109
                                                     STN: 313

 DEPTH      PRESS      SAL       TEMP    SIGMA-T
    .3         .3     32.19      7.06     25.20
   2.0        2.0     32.21      7.06     25.22
   5.0        5.0     32.21      7.05     25.21
   9.9       10.0     32.21      7.09     25.21
  15.0       15.1     32.21      7.08     25.21
  19.8       20.0     32.21      7.10     25.21
  24.9       25.0     32.21      7.10     25.21
  29.8       29.9     32.21      7.08     25.21
  34.8       35.0     32.22      7.09     25.22
  39.7       40.0     32.23      7.12     25.23
  44.6       44.9     32.39      7.38     25.32
  49.6       49.9     32.63      7.72     25.46
  59.6       60.0     32.78      7.62     25.58
  69.5       70.0     33.24      8.09     25.88
  80.5       81.0     33.41      8.06     26.02
  90.4       91.0     33.54      7.95     26.13
 100.4      101.1     33.65      7.88     26.23
 110.4      111.1     33.75      7.75     26.33
 120.3      121.0     33.76      7.74     26.34
 130.1      131.0     33.84      7.64     26.42
 140.2      141.1     33.87      7.58     26.45
 150.1      151.1     33.89      7.49     26.48
 159.8      160.9     33.90      7.45     26.49
 163.7      164.8     33.90      7.45     26.49
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE
LAT N 49 20.00
DATE 1/ 2/79
TIME (PST) 1841

TAPE: U00454   -041
LONG W 126 46.00
PASS NO.111
STN: 315

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	31.94	6.46	25.08
2.0	2.0	31.95	6.46	25.08
5.0	5.0	31.96	6.46	25.10
10.0	10.0	31.93	6.47	25.07
14.9	15.0	31.96	6.50	25.09
20.0	20.1	32.00	6.70	25.10
24.8	25.0	32.01	6.70	25.11
29.8	30.0	32.21	7.16	25.20
34.8	35.0	32.24	7.27	25.21
39.7	40.0	32.34	7.43	25.27
44.7	45.0	32.37	7.48	25.29
49.7	50.0	32.40	7.53	25.30
59.7	60.1	32.47	7.55	25.36
69.7	70.1	32.53	7.58	25.40
80.5	80.9	32.79	7.76	25.57
90.5	91.0	32.95	7.65	25.72
100.3	100.9	33.29	7.60	25.99
105.9	106.6	33.41	7.60	26.08

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 8.50
DATE 3/ 2/79
TIME (PST) 1834

TAPE: U00454 -068
LONG W 126 .00
PASS NO.205
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	32.16	7.41	25.13
2.0	2.0	32.17	7.39	25.14
4.9	4.9	32.17	7.48	25.13
9.9	9.9	32.26	7.56	25.19
14.9	15.0	32.44	7.97	25.27
19.8	20.0	32.55	8.12	25.33
24.9	25.1	32.54	7.89	25.36
29.8	30.0	32.55	7.88	25.37
34.8	35.0	32.57	7.90	25.38
39.8	40.1	32.57	7.90	25.38
44.7	45.0	32.60	7.95	25.39
49.6	49.9	32.69	8.09	25.45
59.6	60.0	33.12	8.25	25.76
69.6	70.1	33.36	8.30	25.94
79.5	80.0	33.49	8.16	26.07
90.4	91.0	33.58	8.00	26.16
100.4	101.0	33.65	7.92	26.23
110.3	111.0	33.73	7.77	26.31
120.3	121.1	33.80	7.63	26.38
130.2	131.0	33.87	7.63	26.44
140.1	141.0	33.90	7.57	26.47
150.0	151.0	33.91	7.32	26.52
159.9	161.0	33.94	7.31	26.54
169.9	171.0	33.96	7.27	26.57
179.8	181.0	33.97	7.23	26.58
189.8	191.1	34.00	7.14	26.62
199.6	201.0	33.99	6.95	26.63
225.4	227.0	34.01	6.74	26.68
250.2	252.0	34.02	6.61	26.70
275.0	277.0	34.04	6.46	26.74
299.8	302.1	34.05	6.30	26.77
324.6	327.0	34.06	6.15	26.79
350.3	353.0	34.08	5.90	26.84
375.1	378.0	34.02	5.39	26.86
399.9	403.1	34.02	5.12	26.89
424.7	428.0	34.09	5.24	26.93
450.4	454.0	34.12	5.23	26.95
475.1	479.0	34.13	5.09	26.98
500.0	504.0	34.13	4.91	27.00
532.3	536.7	34.16	4.79	27.03

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 10.60
DATE 3/ 2/79
TIME (PST) 1947

TAPE: U00454 -069
LONG W 125 56.20
PASS NO.208
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.2	.2	32.05	7.08	25.09	
2.0	2.0	32.06	7.09	25.09	
4.9	5.0	32.05	7.09	25.09	
9.9	10.0	32.06	7.07	25.10	
15.0	15.1	32.09	6.93	25.14	
19.9	20.0	32.26	7.49	25.20	
24.8	25.0	32.35	7.31	25.29	6.50
29.7	29.9	32.52	8.04	25.32	
34.9	35.1	32.62	8.23	25.38	
39.7	39.9	32.63	8.15	25.39	
44.8	45.1	32.66	8.05	25.43	
49.5	49.8	32.68	8.00	25.45	6.40
59.7	60.0	32.78	8.10	25.52	
69.6	70.1	33.04	8.23	25.70	
74.6	75.0	33.15	8.25	25.79	4.19
79.7	80.2	33.27	8.24	25.89	
89.5	90.0	33.44	8.10	26.03	
100.4	101.0	33.62	8.07	26.18	3.73
110.3	111.0	33.73	8.01	26.28	
120.2	121.0	33.77	7.70	26.35	
125.1	125.9	33.79	7.64	26.38	3.15
130.2	131.0	33.82	7.61	26.40	
140.1	141.0	33.86	7.55	26.45	
150.1	151.1	33.89	7.52	26.48	3.06
159.9	161.0	33.93	7.49	26.51	
169.9	171.0	33.96	7.39	26.55	
179.8	181.0	33.97	7.16	26.59	
189.8	191.1	33.98	7.07	26.61	
200.5	201.9	33.98	6.98	26.62	2.64
225.5	227.1	34.01	6.77	26.67	
250.2	252.0	34.01	6.43	26.72	2.37
275.0	277.0	34.00	6.10	26.76	
299.8	302.0	34.01	6.00	26.78	
324.6	327.1	34.05	5.99	26.81	
350.2	352.9	34.07	5.85	26.84	1.55
375.2	378.1	34.08	5.72	26.87	
400.1	403.2	34.09	5.52	26.90	
424.5	427.9	34.11	5.39	26.92	
450.3	453.9	34.12	5.21	26.95	
475.2	479.0	34.13	5.05	26.98	
500.0	504.0	34.14	4.96	27.00	.88
555.9	560.5	34.18	4.67	27.06	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01   CODE
LAT N 48 12.90
DATE 3/ 2/79
TIME (PST) 2033

TAPE: U00454   -070
LONG W 125 52.00
PASS NO.209
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	32.09	7.00	25.13	
2.1	2.1	32.10	7.01	25.13	
4.9	5.0	32.13	6.98	25.16	
9.9	10.0	32.14	6.96	25.18	
14.9	15.0	32.18	7.11	25.19	
19.9	20.0	32.41	7.96	25.25	
24.8	24.9	32.56	8.32	25.32	6.79
29.9	30.0	32.61	8.30	25.35	
34.8	35.0	32.62	8.21	25.37	
39.8	40.0	32.65	7.70	25.47	
44.7	44.9	32.79	8.22	25.51	
49.8	50.1	32.90	8.14	25.61	5.91
59.6	60.0	33.04	8.27	25.69	
69.6	70.0	33.28	8.29	25.88	
74.6	75.1	33.37	8.23	25.96	4.65
80.5	81.0	33.43	8.18	26.02	
90.4	91.0	33.56	8.06	26.13	
100.3	100.9	33.61	8.09	26.17	3.55
110.3	111.0	33.67	8.00	26.23	
120.2	121.0	33.76	7.88	26.32	
125.2	126.0	33.78	7.87	26.33	3.18
130.1	131.0	33.80	7.85	26.36	
140.1	141.0	33.86	7.82	26.41	
150.0	151.0	33.90	7.70	26.45	2.60
160.0	161.0	33.90	7.65	26.46	
169.8	171.0	33.91	7.53	26.49	
179.8	181.0	33.95	7.36	26.54	
189.7	191.0	33.97	7.24	26.57	
199.7	201.1	33.97	7.17	26.59	2.60
225.4	227.0	34.00	6.98	26.64	
250.1	251.9	34.02	6.74	26.68	2.18
275.1	277.1	34.03	6.53	26.72	
299.7	302.0	34.04	6.38	26.75	
325.5	327.9	34.06	6.09	26.80	
350.3	353.0	34.07	5.82	26.84	1.45
375.1	378.0	34.07	5.61	26.87	
399.9	403.0	34.09	5.39	26.91	
424.6	427.9	34.10	5.18	26.94	
450.4	454.0	34.10	4.77	26.99	
475.1	478.9	34.13	4.66	27.03	
499.9	504.0	34.17	4.76	27.05	
522.5	526.8	34.18	4.72	27.06	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  01   CODE                              TAPE: U00454   -071
LAT  N 48 15.10                                    LONG W 125 47.70
DATE  3/ 2/79                                      PASS NO.211
TIME (PST) 2145                                    STN: 108

 DEPTH      PRESS        SAL       TEMP    SIGMA-T
    .5         .5      31.91       6.98     24.99
   2.0        2.0      31.91       6.98     24.99
   5.0        5.0      31.91       6.98     24.99
  10.0       10.0      31.96       7.05     25.02
  14.9       15.0      32.11       6.93     25.16
  20.0       20.1      32.14       6.93     25.18
  24.6       24.8      32.16       6.96     25.19
  29.8       30.0      32.32       7.94     25.18
  34.8       35.0      32.53       7.63     25.39
  39.7       40.0      32.54       7.55     25.41
  44.8       45.1      32.63       7.62     25.47
  49.8       50.1      32.73       7.73     25.54
  59.5       59.9      32.95       7.90     25.68
  69.6       70.0      33.23       8.28     25.85
  80.6       81.1      33.46       8.16     26.04
  90.5       91.1      33.56       8.20     26.11
 100.2      100.9      33.62       8.17     26.17
 110.3      111.0      33.70       8.10     26.24
 120.2      121.0      33.75       8.05     26.29
 130.3      131.1      33.80       7.87     26.35
 139.9      140.9      33.83       7.89     26.37
 150.1      151.1      33.86       7.82     26.40
 160.0      161.0      33.87       7.80     26.42
 170.0      171.2      33.89       7.72     26.45
 179.6      180.8      33.93       7.48     26.51
 189.7      191.0      33.96       7.29     26.56
 199.6      201.0      33.99       7.02     26.62
 225.5      227.1      34.01       6.76     26.67
 250.3      252.1      34.03       6.54     26.72
 275.0      277.1      34.03       6.47     26.73
 280.0      282.0      34.03       6.47     26.73
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 18.60
DATE 3/ 2/79
TIME (PST) 2225

TAPE: U00454 -072
LONG W 125 41.20
PASS NO.213
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.8	.8	31.94	7.10	25.00	
2.0	2.0	31.94	7.11	25.00	
5.0	5.0	31.94	7.10	25.00	
10.1	10.1	31.94	7.10	25.00	
15.0	15.0	32.12	7.36	25.11	
19.9	20.0	32.21	7.56	25.15	
24.9	25.0	32.42	8.13	25.24	6.69
29.9	30.1	32.58	8.33	25.33	
34.9	35.1	32.62	8.31	25.37	
39.9	40.1	32.64	8.30	25.38	
44.6	44.9	32.66	8.29	25.39	
49.6	49.9	32.67	8.29	25.40	6.05
59.7	60.0	32.75	8.22	25.48	
70.5	70.9	33.00	8.21	25.67	
74.6	75.1	33.15	8.26	25.78	4.34
79.5	80.0	33.32	8.27	25.92	
90.3	90.9	33.53	8.21	26.09	
100.4	101.0	33.65	8.03	26.21	3.40
110.3	111.0	33.70	7.95	26.26	
120.3	121.1	33.70	7.82	26.28	
125.2	126.0	33.79	7.78	26.35	2.82
130.2	131.1	33.80	7.72	26.38	
140.0	140.9	33.81	7.69	26.39	

CRUISE NO: 01 CODE
LAT N 48 22.00
DATE 3/ 2/79
TIME (PST) 2317

TAPE: U00454 -073
LONG W 125 34.70
PASS NO.215
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	32.15	6.81	25.20
2.2	2.2	32.16	6.85	25.21
4.9	4.9	32.16	6.86	25.21
10.1	10.2	32.17	6.85	25.21
15.0	15.0	32.20	6.86	25.23
19.9	20.1	32.20	6.85	25.23
24.9	25.0	32.25	6.79	25.28
29.8	30.0	32.38	7.23	25.33
34.8	35.0	32.46	7.15	25.40
39.8	40.0	32.55	7.39	25.44
44.5	44.8	32.75	7.58	25.57
49.8	50.1	32.82	7.70	25.61
59.6	60.0	33.17	7.85	25.86
69.6	70.0	33.37	7.86	26.02
79.6	80.1	33.46	7.83	26.09
90.5	91.1	33.61	7.79	26.22
100.3	100.9	33.79	7.72	26.37
110.3	111.0	33.81	7.70	26.38
120.2	121.0	33.81	7.69	26.39
127.0	127.8	33.81	7.69	26.38

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 25.50
DATE 3/ 2/79
TIME (PST) 2356

TAPE: U00454 -074
LONG W 125 28.30
PASS NO.217
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.5	.5	32.30	6.74	25.33	
2.1	2.1	32.30	6.74	25.33	
4.9	4.9	32.30	6.74	25.33	
10.0	10.1	32.31	6.75	25.34	
14.9	15.0	32.34	6.78	25.35	
19.8	19.9	32.37	6.83	25.37	
24.8	24.9	32.74	7.56	25.57	5.49
29.9	30.1	32.97	7.84	25.70	
34.8	35.0	33.08	7.88	25.78	
39.7	40.0	33.14	7.89	25.83	
44.8	45.0	33.19	7.89	25.87	
49.7	50.0	33.24	7.91	25.90	4.23
59.7	60.0	33.49	7.84	26.11	
69.5	70.0	33.56	7.79	26.18	
74.5	75.0	33.58	7.78	26.20	3.30
80.3	80.8	33.59	7.78	26.20	
90.3	90.8	33.66	7.76	26.26	
100.4	101.0	33.74	7.72	26.33	2.85
109.3	110.1	33.76	7.71	26.35	
120.2	121.0	33.78	7.70	26.36	
124.9	125.8	33.78	7.70	26.36	

CRUISE NO: 01 CODE
LAT N 48 28.90
DATE 4/ 2/79
TIME (PST) 0056

TAPE: U00454 -075
LONG W 125 21.80
PASS NO.219
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	32.17	6.88	25.21
1.9	1.9	32.17	6.88	25.21
5.0	5.0	32.18	6.88	25.21
9.7	9.7	32.18	6.88	25.21
14.8	14.9	32.19	6.87	25.22
19.7	19.9	32.30	6.98	25.29
24.8	24.9	32.61	7.63	25.45
29.8	30.0	32.92	7.84	25.66
34.6	34.8	33.06	7.86	25.78
39.7	40.0	33.20	7.90	25.88
44.7	45.0	33.25	7.89	25.91
49.7	50.0	33.28	7.89	25.95
59.6	60.0	33.33	7.89	25.98
69.6	70.1	33.42	7.88	26.05
79.6	80.1	33.53	7.85	26.14
90.4	91.0	33.58	7.83	26.18
100.4	101.1	33.59	7.80	26.20
110.2	110.9	33.64	7.76	26.24
120.2	121.0	33.70	7.70	26.30
130.1	130.9	33.74	7.67	26.34
135.8	136.7	33.75	7.68	26.34

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 32.20
DATE 4/ 2/79
TIME (PST) 0140

TAPE: U00454 -076
LONG W 125 15.50
PASS NO.221
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.7	.7	32.19	6.71	25.25	
2.1	2.2	32.19	6.73	25.25	
4.9	5.0	32.19	6.72	25.24	
10.0	10.1	32.21	6.75	25.26	
15.0	15.1	32.27	6.98	25.27	
19.8	19.9	32.48	7.15	25.42	
24.9	25.0	32.56	7.07	25.49	5.52
29.7	29.9	32.69	7.27	25.57	
34.8	35.0	32.93	7.52	25.72	
39.8	40.0	32.97	7.55	25.75	
44.8	45.0	33.08	7.72	25.81	
49.7	50.0	33.15	7.79	25.85	4.40
59.7	60.1	33.23	7.86	25.90	
69.6	70.0	33.37	7.90	26.01	
75.4	75.9	33.44	7.92	26.06	3.79
80.5	81.0	33.48	7.88	26.10	
90.5	91.1	33.54	7.84	26.16	
100.3	100.9	33.56	7.81	26.17	3.30
106.3	107.0	33.60	7.71	26.22	

CRUISE NO: 01 CODE
LAT N 48 35.60
DATE 4/ 2/79
TIME (PST) 0300

TAPE: U00454 -077
LONG W 125 9.00
PASS NO.223
STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.6	.6	32.45	6.85	25.43
2.1	2.2	32.44	6.85	25.43
5.0	5.0	32.45	6.85	25.43
10.0	10.0	32.45	6.86	25.43
14.8	14.9	32.47	6.88	25.44
19.9	20.1	32.48	6.89	25.45
24.7	24.9	32.49	6.89	25.46
29.9	30.0	32.49	6.89	25.46
34.8	35.0	32.49	6.86	25.46
39.8	40.0	32.62	6.96	25.55
44.7	45.0	32.66	6.98	25.58
49.8	50.1	32.77	7.11	25.65
59.6	60.0	32.94	7.36	25.75
69.6	70.0	33.08	7.53	25.84
80.5	81.0	33.19	7.63	25.91
90.5	91.0	33.31	7.66	26.00
100.4	101.0	33.39	7.68	26.06
109.2	109.9	33.41	7.69	26.07

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 01 CODE
LAT N 48 39.00
DATE 4/ 2/79
TIME (PST) 0410

TAPE: U00454 -078
LONG W 125 2.50
PASS NO.225
STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.9	.9	31.98	6.46	25.11	
2.3	2.3	32.05	6.38	25.18	
5.0	5.0	32.05	6.38	25.18	
10.0	10.0	32.05	6.39	25.18	
14.9	15.0	32.05	6.39	25.18	
19.9	20.0	32.08	6.43	25.19	
24.9	25.1	32.10	6.48	25.20	5.78
30.0	30.2	32.13	6.49	25.23	
34.7	34.9	32.22	6.61	25.28	
39.9	40.1	32.40	6.86	25.39	
44.8	45.0	32.53	7.01	25.47	
49.7	50.0	32.68	7.11	25.58	5.03
55.7	56.0	32.73	7.17	25.61	

CRUISE NO: 02 CODE
LAT N 48 39.00
DATE 8/ 3/79
TIME (PST) 1727

TAPE: U00454 -079
LONG W 125 2.50
PASS NO. 31
STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	29.02	8.75	22.48
2.0	2.0	29.43	8.53	22.83
5.0	5.0	29.57	8.54	22.94
10.0	10.0	29.85	8.47	23.17
15.0	15.0	29.86	8.43	23.18
19.9	20.0	30.01	8.32	23.31
24.9	25.0	30.45	8.24	23.67
29.9	30.0	30.95	7.40	24.18
34.9	35.0	31.29	7.13	24.48
39.8	40.0	31.38	7.13	24.55
44.8	45.0	31.65	8.00	24.64
49.8	50.0	31.65	8.03	24.64
60.2	60.5	31.70	8.08	24.67
60.7	61.0	31.70	8.08	24.67

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 02 CODE
LAT N 48 35.60
DATE 8/ 3/79
TIME (PST) 1804

TAPE: U00454 -080
LONG W 125 9.00
PASS NO. 33
STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	28.73	8.70	22.26
2.0	2.0	28.73	8.72	22.25
5.0	5.0	29.02	8.64	22.49
10.0	10.0	30.35	8.63	23.54
14.9	15.0	31.43	8.63	24.38
19.9	20.0	31.83	8.57	24.70
24.9	25.0	32.13	8.44	24.96
29.9	30.0	32.36	8.49	25.13
34.8	35.0	32.48	8.42	25.23
39.8	40.0	32.52	8.49	25.25
44.8	45.0	32.54	8.49	25.27
50.2	50.5	32.56	8.49	25.29
60.2	60.5	32.60	8.50	25.32
70.1	70.5	32.59	8.50	25.31
80.1	80.5	32.60	8.50	25.32
90.0	90.5	32.72	8.44	25.42
98.4	99.0	32.78	8.38	25.48

CRUISE NO: 02 CODE
LAT N 48 32.20
DATE 8/ 3/79
TIME (PST) 1842

TAPE: U00454 -081
LONG W 125 15.50
PASS NO. 35
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	31.19	8.93	24.15
2.0	2.0	31.49	8.80	24.40
5.0	5.0	31.79	8.69	24.65
10.0	10.0	32.18	8.57	24.98
14.9	15.0	32.37	8.50	25.14
19.9	20.0	32.50	8.48	25.24
24.9	25.0	32.61	8.41	25.34
29.8	30.0	32.65	8.38	25.37
34.8	35.0	32.69	8.26	25.42
39.8	40.0	32.70	8.23	25.43
45.2	45.5	32.70	8.23	25.44
50.2	50.5	32.71	8.22	25.45
60.2	60.5	32.73	8.18	25.46
70.1	70.5	32.74	8.17	25.48
80.0	80.5	32.77	8.18	25.49
90.0	90.5	32.79	8.18	25.52
99.9	100.5	32.82	8.15	25.54
102.4	103.0	32.83	8.13	25.55

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 02 CODE
TAPE: U00454 -082
LAT N 48 28.90
LONG W 125 21.80
DATE 8/ 3/79
PASS NO. 37
TIME (PST) 1922
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.0	1.0	32.57	8.27	25.33
2.0	2.0	32.57	8.27	25.33
5.0	5.0	32.62	8.29	25.36
9.9	10.0	32.71	8.24	25.44
14.9	15.0	32.71	8.21	25.45
19.9	20.0	32.72	8.22	25.46
24.9	25.0	32.74	8.15	25.48
29.8	30.0	32.76	8.12	25.50
34.8	35.0	32.78	8.11	25.52
39.8	40.0	32.78	8.10	25.52
45.2	45.5	32.78	8.09	25.52
50.2	50.5	32.78	8.09	25.52
60.1	60.5	32.80	8.07	25.54
70.1	70.5	32.81	8.04	25.55
80.0	80.5	32.82	8.03	25.56
89.9	90.5	32.85	8.02	25.58
99.9	100.5	32.88	8.04	25.61
109.8	110.5	32.91	8.05	25.63
120.2	121.0	32.93	8.04	25.65
130.2	131.0	32.97	8.05	25.67
140.1	141.0	32.97	8.06	25.67
142.1	143.0	32.97	8.06	25.67

CRUISE NO: 02 CODE
TAPE: U00454 -083
LAT N 48 25.50
LONG W 125 28.30
DATE 8/ 3/79
PASS NO. 39
TIME (PST) 1959
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	32.22	8.34	25.04
2.0	2.0	32.22	8.35	25.04
5.0	5.0	32.22	8.35	25.04
9.9	10.0	32.26	8.23	25.09
14.9	15.0	32.46	8.18	25.25
19.9	20.0	32.60	8.23	25.36
24.9	25.0	32.64	8.21	25.39
29.8	30.0	32.66	8.20	25.41
34.8	35.0	32.68	8.19	25.43
39.8	40.0	32.71	8.14	25.46
45.2	45.5	32.72	8.15	25.46
50.2	50.5	32.73	8.14	25.47
60.1	60.5	32.74	8.03	25.50
70.1	70.5	32.75	8.05	25.51
80.0	80.5	32.81	8.08	25.54
90.0	90.5	32.81	8.09	25.54
99.9	100.5	32.82	8.09	25.55
109.8	110.5	32.85	8.08	25.57
119.8	120.5	32.87	8.07	25.60
127.2	128.0	32.96	8.13	25.65

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 02 CODE
LAT N 46 22.00
DATE 8/ 3/79
TIME (PST) 2040

TAPE: U00454 -084
LONG W 125 34.70
PASS NO. 41
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	32.47	8.28	25.25
2.0	2.0	32.48	8.28	25.25
5.0	5.0	32.64	8.26	25.38
9.9	10.0	32.73	8.36	25.44
14.9	15.0	32.78	8.39	25.47
19.9	20.0	32.78	8.39	25.47
24.9	25.0	32.78	8.37	25.48
29.8	30.0	32.78	8.35	25.48
34.8	35.0	32.78	8.33	25.48
39.8	40.0	32.78	8.32	25.49
45.2	45.5	32.77	8.31	25.48
50.2	50.5	32.77	8.27	25.49
60.1	60.5	32.80	8.21	25.52
70.1	70.5	32.83	8.20	25.54
80.0	80.5	32.89	8.16	25.60
89.9	90.5	32.90	8.13	25.61
99.9	100.5	32.91	8.16	25.61
109.8	110.5	32.96	8.16	25.65
120.2	121.0	32.98	8.17	25.67
130.2	131.0	33.08	8.17	25.74
140.1	141.0	33.32	8.16	25.94
149.0	150.0	33.43	8.10	26.03

```
COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 02   CODE                      TAPE: U00454   -085
LAT  N 48 18.60                           LONG W 125 41.20
DATE  8/ 3/79                             PASS NO. 43
TIME (PST) 2119                           STN: 107

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .0         .0     32.73       8.51     25.42
   2.0        2.0     32.73       8.51     25.42
   5.0        5.0     32.73       8.51     25.42
   9.9       10.0     32.73       8.50     25.42
  14.9       15.0     32.73       8.51     25.42
  19.9       20.0     32.74       8.49     25.43
  24.9       25.0     32.75       8.45     25.44
  29.8       30.0     32.75       8.47     25.44
  34.8       35.0     32.75       8.47     25.44
  39.8       40.0     32.75       8.46     25.44
  45.2       45.5     32.77       8.45     25.45
  50.2       50.5     32.78       8.48     25.46
  60.1       60.5     32.90       8.59     25.54
  70.1       70.5     32.97       8.58     25.60
  80.0       80.5     33.02       8.47     25.65
  89.9       90.5     33.05       8.43     25.68
  99.9      100.5     33.05       8.48     25.68
 109.8      110.5     33.14       8.53     25.73
 120.2      121.0     33.15       8.53     25.74
 130.2      131.0     33.15       8.40     25.76
 140.1      141.0     33.70       7.95     26.26
 148.0      149.0     33.78       7.84     26.34
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 02   CODE
LAT N 48 15.10
DATE 8/ 3/79
TIME (PST) 2158

TAPE: U00454   -086
LONG W 125 47.70
PASS NO. 45
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	32.74	8.36	25.45
2.0	2.0	32.74	8.44	25.43
5.0	5.0	32.73	8.44	25.43
9.9	10.0	32.74	8.40	25.44
14.9	15.0	32.72	8.36	25.43
19.9	20.0	32.74	8.31	25.46
24.9	25.0	32.75	8.31	25.46
29.8	30.0	32.75	8.31	25.46
34.8	35.0	32.76	8.28	25.47
39.8	40.0	32.77	8.26	25.49
45.2	45.5	32.79	8.24	25.50
50.2	50.5	32.83	8.24	25.54
60.1	60.5	32.82	8.18	25.54
70.1	70.5	32.85	8.15	25.56
80.0	80.5	32.87	8.13	25.58
89.9	90.5	32.90	8.15	25.60
99.9	100.5	32.91	8.18	25.61
109.8	110.5	32.98	8.16	25.67
120.2	121.0	33.20	8.24	25.83
130.2	131.0	33.36	8.27	25.95
140.1	141.0	33.64	8.10	26.19
150.0	151.0	33.67	8.02	26.23
160.0	161.0	33.72	7.92	26.28
169.9	171.0	33.74	7.88	26.31
179.8	181.0	33.75	7.84	26.32
190.2	191.5	33.78	7.78	26.35
200.1	201.5	33.78	7.75	26.35
210.6	212.0	33.78	7.48	26.39

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  02    CODE                              TAPE: U00454   -087
LAT  N 48 12.90                                     LONG W 125 52.00
DATE  8/ 3/79                                       PASS NO. 47
TIME (PST) 2227                                     STN: 109

  DEPTH      PRESS       SAL        TEMP    SIGMA-T
     .0         .0      32.76       8.47     25.45
    2.0        2.0      32.76       8.47     25.44
    5.0        5.0      32.75       8.47     25.44
    9.9       10.0      32.74       8.47     25.44
   14.9       15.0      32.74       8.40     25.44
   19.9       20.0      32.75       8.33     25.46
   24.9       25.0      32.75       8.33     25.46
   29.8       30.0      32.75       8.31     25.47
   34.8       35.0      32.76       8.30     25.47
   39.8       40.0      32.77       8.20     25.49
   45.2       45.5      32.79       8.18     25.52
   50.2       50.5      32.82       8.13     25.55
   60.1       60.5      32.88       8.13     25.59
   70.1       70.5      32.91       8.13     25.61
   80.0       80.5      32.91       8.13     25.61
   89.9       90.5      32.96       8.16     25.65
   99.9      100.5      33.08       8.23     25.73
  109.8      110.5      33.23       8.47     25.81
  120.2      121.0      33.29       8.47     25.86
  130.2      131.0      33.36       8.43     25.92
  140.1      141.0      33.47       8.34     26.03
  150.0      151.0      33.67       8.14     26.21
  160.0      161.0      33.71       8.13     26.24
  169.9      171.0      33.74       8.08     26.27
  179.8      181.0      33.75       8.00     26.29
  190.2      191.5      33.76       8.00     26.30
  200.1      201.5      33.77       7.93     26.32
  225.0      226.5      33.82       7.66     26.40
  250.3      252.0      33.84       7.39     26.45
  275.0      277.0      33.85       7.05     26.51
  299.8      302.0      33.86       6.54     26.58
  325.1      327.5      33.87       6.08     26.65
  349.9      352.5      33.91       5.73     26.73
  375.2      378.0      33.91       5.61     26.74
  400.0      403.0      33.91       5.48     26.76
  425.2      428.5      33.90       5.32     26.77
  428.7      432.0      33.90       5.28     26.77
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03   CODE
                                                TAPE: U00454   -088
LAT  N 48 39.00
                                                LONG W 125  2.50
DATE 19/ 4/79
                                                PASS NO.  1
TIME (PST) 1219
                                                STN: 101

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .2         .2      31.55      8.67     24.47
   1.8        1.8      31.55      8.63     24.48
   5.0        5.0      31.64      8.56     24.56
  10.0       10.0      31.67      8.51     24.59
  14.9       14.9      31.73      8.46     24.64
  19.9       20.0      31.82      8.39     24.72
  24.9       25.0      32.03      8.38     24.89
  29.8       30.0      32.18      8.26     25.03
  34.8       35.0      32.21      8.23     25.05
  39.9       40.1      32.24      8.23     25.08
  44.7       44.9      32.29      8.23     25.12
  49.7       50.0      32.30      8.23     25.12
  49.7       50.0      32.30      8.23     25.12

CRUISE NO:  03   CODE
                                                TAPE: U00454   -089
LAT  N 48 35.60
                                                LONG W 125  9.00
DATE 19/ 4/79
                                                PASS NO.  3
TIME (PST) 1256
                                                STN: 102

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .9         .9      32.05      8.60     24.87
   2.0        2.0      32.04      8.60     24.87
   5.0        5.0      32.05      8.50     24.88
  10.0       10.0      32.09      8.40     24.93
  14.9       15.0      32.10      8.39     24.95
  20.0       20.1      32.15      8.34     24.99
  24.7       24.9      32.23      8.27     25.06
  29.8       29.9      32.30      8.22     25.13
  34.7       34.9      32.38      8.15     25.20
  39.8       40.0      32.42      8.16     25.23
  44.7       45.0      32.51      8.15     25.30
  49.7       50.0      32.58      8.17     25.35
  59.6       60.0      32.58      8.17     25.35
  69.6       70.0      32.58      8.17     25.35
  80.4       80.9      32.61      8.12     25.38
  90.4       90.9      32.73      8.06     25.48
 100.4      101.0      33.06      8.00     25.75
 110.3      110.9      33.44      7.84     26.07
 110.3      110.9      33.44      7.84     26.07
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 32.20
DATE 19/ 4/79
TIME (PST) 1342

TAPE: U00454 -090
LONG W 125 15.50
PASS NO. 5
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	32.22	8.61	25.01
2.0	2.0	32.22	8.59	25.00
4.9	5.0	32.22	8.60	25.00
10.0	10.0	32.24	8.47	25.04
14.9	14.9	32.30	8.27	25.12
19.8	19.9	32.43	8.09	25.24
24.8	25.0	32.50	8.05	25.30
29.8	29.9	32.60	8.04	25.38
34.8	35.0	32.74	8.04	25.49
39.7	40.0	32.86	8.01	25.59
44.8	45.1	33.01	8.00	25.71
49.7	49.9	33.03	8.00	25.73
59.7	60.1	33.13	7.98	25.81
69.7	70.1	33.22	7.95	25.89
79.5	80.0	33.29	7.93	25.94
89.6	90.1	33.45	7.84	26.08
100.3	101.0	33.52	7.79	26.14
110.3	111.0	33.60	7.71	26.21
112.1	112.9	33.60	7.71	26.22

CRUISE NO: 03 CODE
LAT N 48 28.90
DATE 19/ 4/79
TIME (PST) 1424

TAPE: U00454 -091
LONG W 125 21.80
PASS NO. 7
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.88	8.80	24.71
2.0	2.0	31.88	8.80	24.71
4.9	4.9	31.91	8.75	24.74
10.0	10.1	32.27	8.30	25.09
15.0	15.1	32.32	8.25	25.14
19.8	19.9	32.34	8.22	25.16
24.8	24.9	32.50	8.06	25.30
29.8	30.0	32.59	7.95	25.39
34.9	35.1	32.69	8.01	25.46
39.7	39.9	32.81	8.05	25.55
44.8	45.0	32.89	8.05	25.61
49.7	50.0	32.97	8.00	25.68
59.6	60.0	33.12	7.97	25.81
69.7	70.1	33.36	8.14	25.97
80.5	81.0	33.48	8.09	26.07
90.4	90.9	33.58	8.01	26.16
100.3	101.0	33.64	7.96	26.22
110.4	111.1	33.69	7.90	26.26
120.2	121.0	33.70	7.88	26.27
130.0	130.8	33.72	7.84	26.29
140.1	141.0	33.74	7.81	26.31
149.1	150.1	33.75	7.78	26.32

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 25.50
DATE 19/ 4/79
TIME (PST) 1510

TAPE: U00454 -092
LONG W 125 28.30
PASS NO. 9
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.5	.5	31.88	8.86	24.70	
1.9	2.0	31.88	8.86	24.70	
4.7	4.7	31.89	8.84	24.71	
10.2	10.3	31.91	8.78	24.74	
14.9	15.0	32.21	8.55	25.00	
19.8	19.9	32.28	8.40	25.08	
24.9	25.0	32.37	8.17	25.19	
29.9	30.0	32.44	8.08	25.25	
34.8	35.0	32.52	8.11	25.32	
39.9	40.1	32.66	8.09	25.42	
44.7	45.0	32.70	8.07	25.46	
49.6	49.9	32.75	8.06	25.50	5.06
59.7	60.1	32.81	8.04	25.55	
69.7	70.1	32.98	7.98	25.69	
74.7	75.1	33.15	8.01	25.82	4.32
79.5	80.0	33.28	8.06	25.92	
90.5	91.0	33.56	8.05	26.14	
100.3	100.9	33.62	7.99	26.19	3.18
110.3	111.0	33.66	7.93	26.23	
120.2	121.0	33.73	7.81	26.30	
125.2	126.0	33.76	7.76	26.33	2.63
130.2	131.1	33.77	7.74	26.34	
140.0	140.9	33.78	7.73	26.35	
150.0	151.0	33.79	7.70	26.37	
150.0	151.0	33.79	7.70	26.37	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 22.00
DATE 19/ 4/79
TIME (PST) 1604

TAPE: U00454 -093
LONG W 125 34.70
PASS NO. 11
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	32.17	8.91	24.92
2.0	2.0	32.17	8.91	24.92
4.9	4.9	32.18	8.90	24.93
9.9	10.0	32.20	8.90	24.95
14.9	15.0	32.48	8.93	25.16
19.9	20.0	32.60	8.94	25.25
25.0	25.1	32.61	8.88	25.27
29.7	29.9	32.62	8.68	25.30
34.7	34.9	32.65	8.58	25.34
39.7	39.9	32.73	8.56	25.41
44.7	44.9	32.75	8.53	25.43
49.6	49.9	32.76	8.50	25.44
59.7	60.0	32.84	8.34	25.53
69.6	70.0	33.02	8.30	25.67
79.4	79.9	33.18	8.33	25.80
90.0	90.6	33.27	8.24	25.88
100.4	101.0	33.33	8.17	25.94
110.3	111.0	33.75	7.67	26.34
120.2	120.9	33.86	7.38	26.47
130.0	130.9	33.91	7.17	26.54
134.1	134.9	33.91	7.16	26.54

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 18.60
DATE 19/ 4/79
TIME (PST) 1649

TAPE: U00454 -094
LONG W 125 41.20
PASS NO. 13
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	32.24	8.92	24.97
2.0	2.0	32.24	8.92	24.97
5.0	5.0	32.24	8.92	24.98
10.2	10.3	32.25	8.92	24.98
14.9	15.0	32.25	8.91	24.98
19.9	20.0	32.35	8.73	25.09
24.7	24.9	32.49	8.74	25.19
29.8	30.0	32.57	8.83	25.25
34.8	35.0	32.61	8.85	25.28
39.7	39.9	32.62	8.83	25.29
44.7	45.0	32.64	8.76	25.31
49.7	50.0	32.72	8.75	25.38
59.6	60.0	32.93	8.65	25.55
69.6	70.0	33.02	8.54	25.64
80.6	81.1	33.20	8.35	25.81
90.5	91.0	33.35	8.14	25.96
100.4	101.0	33.59	8.02	26.16
110.3	111.0	33.74	7.90	26.30
120.3	121.0	33.81	7.81	26.37
130.0	130.9	33.88	7.46	26.47
138.1	139.0	33.88	7.38	26.49

CRUISE NO: 03 CODE
LAT N 48 15.10
DATE 19/ 4/79
TIME (PST) 1735

TAPE: U00454 -095
LONG W 125 47.70
PASS NO. 14
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	32.31	8.94	25.03
1.9	1.9	32.32	8.94	25.03
5.0	5.0	32.34	8.94	25.05
10.1	10.1	32.36	8.94	25.06
15.0	15.1	32.38	8.94	25.08
19.9	20.1	32.39	8.93	25.09
24.9	25.0	32.40	8.91	25.10
29.8	30.0	32.46	8.80	25.17
34.9	35.1	32.57	8.82	25.25
39.7	39.9	32.61	8.78	25.28
44.6	44.9	32.67	8.65	25.35
49.7	50.0	32.72	8.69	25.39
59.8	60.1	32.91	8.60	25.55
69.5	69.9	33.08	8.50	25.70
80.6	81.1	33.40	8.26	25.98
89.5	90.0	33.51	8.00	26.11
100.3	101.0	33.58	7.67	26.21
101.2	101.8	33.59	7.65	26.22

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 12.90
DATE 19/ 4/79
TIME (PST) 1830

TAPE: U00454 -096
LONG W 125 52.00
PASS NO. 16
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	32.58	8.99	25.23
2.0	2.0	32.58	9.01	25.23
5.0	5.0	32.59	8.99	25.23
10.0	10.0	32.59	8.99	25.23
14.9	15.0	32.59	8.99	25.23
19.9	20.1	32.59	8.99	25.23
24.8	25.0	32.58	8.96	25.23
29.9	30.0	32.58	8.91	25.24
34.8	35.0	32.58	8.86	25.25
39.8	40.0	32.64	8.88	25.29
44.7	45.0	32.65	8.86	25.30
49.5	49.8	32.65	8.84	25.30
59.6	59.9	32.82	8.92	25.43
69.5	69.9	32.94	8.82	25.54
80.5	80.9	33.16	8.47	25.76
90.4	91.0	33.41	8.33	25.98
100.4	101.0	33.52	8.03	26.11
110.4	111.1	33.58	7.87	26.18
120.3	121.0	33.64	7.82	26.24
130.1	130.9	33.73	7.65	26.33
140.0	140.9	33.78	7.54	26.38
149.9	150.9	33.83	7.38	26.45
160.0	161.1	33.84	7.08	26.50
169.9	171.0	33.82	6.97	26.50
179.9	181.1	33.88	6.84	26.56
189.7	191.0	33.88	6.79	26.57
199.6	201.0	33.90	6.64	26.60
225.4	227.0	33.91	6.37	26.65
250.3	252.1	33.93	6.12	26.70
275.0	277.0	33.97	6.05	26.73
299.7	302.0	33.94	5.64	26.76
324.6	327.0	33.95	5.38	26.80
350.3	352.9	33.96	5.21	26.83
375.3	378.2	34.00	5.24	26.85
399.9	403.0	34.01	5.08	26.88
424.7	428.0	34.05	5.00	26.92
450.4	453.9	34.08	5.01	26.95
475.1	478.9	34.10	4.91	26.97
498.9	502.9	34.11	4.86	26.99

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 10.60
DATE 19/ 4/79
TIME (PST) 1914

TAPE: U00454 -097
LONG W 125 56.20
PASS NO. 18
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	32.35	8.88	25.06
2.1	2.1	32.50	8.84	25.18
4.8	4.8	32.51	8.84	25.20
10.2	10.2	32.53	8.85	25.21
14.8	14.8	32.54	8.85	25.22
20.0	20.1	32.59	8.96	25.24
24.8	25.0	32.63	9.01	25.27
29.8	30.0	32.64	9.00	25.27
34.8	35.0	32.64	9.00	25.27
39.7	39.9	32.68	9.14	25.29
44.7	45.0	32.70	9.17	25.29
49.7	50.0	32.70	9.19	25.29
59.6	60.0	32.74	9.10	25.34
70.5	70.9	32.93	8.57	25.57
80.4	80.9	33.17	8.28	25.80
90.4	91.0	33.40	7.84	26.04
100.3	100.9	33.56	7.98	26.15
110.2	110.9	33.64	7.82	26.23
120.2	121.0	33.72	7.74	26.31
130.2	131.0	33.74	7.49	26.36
140.0	141.0	33.80	7.56	26.40
150.0	151.0	33.81	7.42	26.43
159.8	160.9	33.85	7.32	26.47
169.9	171.1	33.90	7.24	26.52
180.4	181.6	33.91	7.10	26.55
189.8	191.1	33.88	6.84	26.56
199.7	201.1	33.92	6.89	26.58
225.5	227.1	33.91	6.45	26.64
250.1	251.9	33.91	6.06	26.69
274.9	276.9	33.93	5.81	26.73
299.8	302.0	33.95	5.64	26.77
324.7	327.2	33.95	5.40	26.80
350.3	352.9	33.96	5.29	26.82
375.2	378.1	33.98	5.14	26.85
400.0	403.1	34.02	5.13	26.88
424.7	428.1	34.03	5.01	26.90
450.4	454.0	34.06	5.00	26.93
474.9	478.7	34.05	4.68	26.96
498.6	502.7	34.09	4.73	26.98

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 03 CODE
LAT N 48 8.50
DATE 19/ 4/79
TIME (PST) 1953

TAPE: U00454 -098
LONG W 126 .00
PASS NO. 20
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	32.43	8.92	25.12
2.0	2.0	32.50	8.83	25.19
4.8	4.9	32.52	8.83	25.20
10.0	10.0	32.52	8.83	25.21
14.9	15.0	32.52	8.83	25.21
19.9	20.1	32.53	8.83	25.21
24.9	25.0	32.53	8.83	25.21
30.0	30.1	32.53	8.80	25.22
34.8	35.0	32.52	8.74	25.22
39.8	40.1	32.54	8.66	25.25
44.6	44.9	32.62	8.83	25.28
49.8	50.0	32.63	8.84	25.29
60.4	60.8	32.79	8.28	25.50
69.7	70.1	33.09	7.98	25.78
79.6	80.1	33.23	7.87	25.91
90.4	91.0	33.35	7.73	26.02
100.3	100.9	33.51	7.71	26.14
110.4	111.1	33.60	7.43	26.26
120.3	121.1	33.67	7.50	26.30
130.1	131.0	33.75	7.48	26.37
140.0	140.9	33.77	7.48	26.38
150.0	151.0	33.79	7.36	26.42
160.0	161.0	33.85	7.42	26.46
169.9	171.1	33.87	7.32	26.49
179.8	181.0	33.91	7.22	26.53
189.6	190.9	33.93	7.15	26.56
199.6	201.0	33.95	7.09	26.58
225.4	227.0	33.98	6.91	26.63
250.1	251.9	33.93	6.35	26.67
275.1	277.1	33.93	5.91	26.72
299.7	301.9	33.92	5.65	26.75
324.6	327.1	33.94	5.57	26.77
350.4	353.0	33.97	5.52	26.80
375.2	378.1	33.96	5.18	26.83
399.8	402.9	33.99	5.12	26.86
424.7	428.0	34.03	5.08	26.90
450.4	454.0	34.04	4.94	26.92
475.4	479.2	34.07	4.84	26.96
495.9	499.9	34.09	4.76	26.99

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 8.50
DATE 18/ 5/79
TIME (PST) 1630

TAPE: U00454 -099
LONG W 126 .00
PASS NO. 1
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	32.57	11.37	24.82	
2.1	2.2	32.58	11.37	24.83	
4.9	4.9	32.56	11.37	24.82	
10.0	10.0	32.57	11.35	24.82	
14.8	14.9	32.55	11.30	24.82	
19.8	20.0	32.56	11.09	24.86	
24.8	25.0	32.53	10.21	24.99	5.85
29.9	30.0	32.65	9.73	25.16	
34.7	34.9	32.70	9.18	25.29	
39.8	40.0	32.77	9.18	25.35	
44.8	45.1	32.80	9.14	25.37	
49.8	50.1	32.79	8.69	25.44	5.98
59.8	60.1	32.92	8.37	25.59	
69.8	70.2	33.21	8.44	25.81	
74.6	75.0	33.26	8.40	25.85	4.97
79.6	80.0	33.35	8.29	25.94	
90.3	90.9	33.53	8.19	26.09	
99.5	100.1	33.59	8.15	26.15	3.44
110.3	111.0	33.68	8.03	26.24	
120.3	121.0	33.74	8.01	26.28	
129.2	130.0	33.77	7.84	26.33	
140.0	140.9	33.81	7.81	26.37	
150.1	151.1	33.86	7.80	26.41	2.89
159.8	160.9	33.89	7.68	26.45	
169.8	171.0	33.90	7.59	26.47	
179.7	180.9	33.94	7.47	26.52	
189.7	191.0	33.95	7.36	26.54	
199.5	200.9	33.96	7.27	26.56	1.73
224.7	226.3	33.97	7.04	26.61	
250.2	252.0	33.99	6.76	26.65	1.52
275.1	277.1	34.00	6.48	26.70	
299.9	302.1	33.99	6.23	26.73	2.12
324.6	327.0	33.98	6.00	26.75	
350.5	353.1	34.00	5.89	26.78	
375.2	378.0	34.02	5.82	26.80	
399.8	402.9	34.05	5.67	26.84	1.12
424.7	428.0	34.07	5.54	26.87	
450.4	453.9	34.08	5.35	26.91	
475.4	479.2	34.10	5.21	26.94	
491.0	495.0	34.10	5.07	26.95	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 10.60
DATE 18/ 5/79
TIME (PST) 1638

TAPE: U00454 -100
LONG W 125 56.20
PASS NO. 3
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	32.43	11.39	24.71
5.0	5.1	32.43	11.39	24.70
9.8	9.9	32.43	11.39	24.71
14.9	15.0	32.57	10.84	24.92
20.0	20.1	32.61	10.61	24.99
25.0	25.1	32.63	10.40	25.04
29.8	30.0	32.64	9.80	25.15
34.8	35.0	32.65	9.49	25.21
39.9	40.1	32.65	9.12	25.27
44.6	44.9	32.74	9.24	25.31
49.9	50.1	32.76	8.99	25.37
59.7	60.1	32.89	8.71	25.51
69.6	70.0	33.04	8.35	25.68
79.5	80.0	33.30	8.11	25.93
90.4	90.9	33.41	8.04	26.02
100.3	100.9	33.52	7.92	26.13
110.3	111.0	33.62	7.88	26.21
119.4	120.2	33.67	7.77	26.26
130.3	131.1	33.76	7.81	26.33
140.1	141.0	33.79	7.65	26.38
150.0	150.9	33.88	7.74	26.43
159.9	160.9	33.91	7.59	26.48
169.9	171.0	33.93	7.47	26.51
179.8	181.0	33.93	7.36	26.53
189.9	191.2	33.95	7.26	26.55
199.8	201.2	33.96	7.13	26.58
225.4	227.0	33.96	6.86	26.62
250.3	252.1	33.94	6.44	26.66
275.0	277.0	33.94	6.15	26.70
299.7	301.9	33.99	6.15	26.74
324.6	327.0	33.99	5.87	26.77
350.4	353.0	34.00	5.63	26.81
375.1	378.0	34.03	5.58	26.84
399.9	403.0	34.04	5.40	26.87
424.7	428.0	34.06	5.26	26.90
450.4	454.0	34.09	5.11	26.94
475.1	478.9	34.10	5.02	26.96
487.2	491.1	34.10	4.95	26.97

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  04   CODE                             TAPE: U00454   -101
LAT  N 48 12.90                                   LONG W 125 52.00
DATE 18/ 5/79                                     PASS NO.  5
TIME (PST) 1730                                   STN: 109

 DEPTH      PRESS       SAL        TEMP     SIGMA-T   OXYGEN
   1.8        1.8      32.30      11.20      24.64
   5.0        5.0      32.30      11.20      24.64
   9.9        9.9      32.31      11.21      24.64
  14.9       15.0      32.31      11.21      24.65
  19.7       19.8      32.60      10.72      24.96
  24.8       25.0      32.55       9.98      25.04     6.81
  29.6       29.8      32.58       9.61      25.13
  34.8       34.9      32.64       9.04      25.27
  39.9       40.1      32.63       8.88      25.29
  44.7       45.0      32.66       8.83      25.31
  49.6       49.9      32.69       8.86      25.34     6.40
  59.7       60.0      32.78       8.61      25.44
  69.6       70.0      32.99       8.39      25.64
  74.6       75.1      33.09       8.32      25.73     2.99
  79.5       80.0      33.13       8.12      25.79
  90.4       91.0      33.45       8.02      26.05
 100.4      101.0      33.57       7.84      26.18     3.67
 110.3      111.0      33.63       7.79      26.23
 120.2      120.9      33.70       7.69      26.30
 130.0      130.8      33.74       7.48      26.36
 140.1      141.1      33.78       7.43      26.40
 150.0      151.0      33.81       7.33      26.44     1.51
 160.1      161.1      33.81       7.34      26.44
 170.1      171.2      33.86       7.15      26.50
 179.7      180.9      33.88       7.10      26.53
 189.8      191.1      33.91       7.02      26.56
 199.7      201.0      33.92       6.87      26.59     1.35
 224.5      226.1      33.96       6.68      26.65
 250.2      252.0      33.98       6.40      26.70     2.01
 275.2      277.1      33.99       6.14      26.74
 299.6      301.8      34.00       5.93      26.78     1.57
 324.6      327.1      34.02       5.77      26.81
 350.4      353.1      34.02       5.57      26.84
 375.6      378.5      34.03       5.24      26.88
 399.9      403.0      34.05       5.12      26.91     1.78
 424.7      428.0      34.09       4.96      26.96
 450.4      454.0      34.11       4.84      26.99
 475.2      479.0      34.12       4.79      27.01
 494.8      498.8      34.13       4.76      27.01
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 15.10
DATE 18/ 5/79
TIME (PST) 1816

TAPE: U00454 -102
LONG W 125 47.70
PASS NO. 7
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	32.13	11.09	24.53
5.0	5.1	32.13	11.08	24.53
9.8	9.9	32.14	11.08	24.53
15.1	15.1	32.35	10.91	24.73
20.1	20.2	32.49	10.22	24.95
24.9	25.1	32.53	10.36	24.97
29.9	30.1	32.55	9.95	25.05
35.5	35.7	32.60	8.95	25.25
40.6	40.8	32.63	8.78	25.30
44.8	45.0	32.64	8.62	25.33
49.7	50.0	32.73	8.52	25.42
59.6	59.9	32.97	8.22	25.65
69.7	70.1	33.14	8.15	25.79
80.5	81.0	33.28	8.10	25.91
90.4	90.9	33.39	8.02	26.01
100.3	101.0	33.58	7.89	26.17
110.3	111.0	33.59	7.85	26.19
119.4	120.2	33.61	7.83	26.21
130.3	131.2	33.74	7.72	26.32
140.2	141.1	33.77	7.69	26.35
149.9	150.9	33.84	7.57	26.42
160.0	161.0	33.88	7.47	26.47
169.7	170.9	33.90	7.38	26.50
179.7	180.9	33.92	7.26	26.53
189.7	191.0	33.93	7.20	26.55
192.8	194.1	33.93	7.17	26.55

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE TAPE: U00454 -103
LAT N 48 18.60 LONG W 125 41.20
DATE 18/ 5/79 PASS NO. 9
TIME (PST) 1914 STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	31.33	11.34	23.87	
1.9	1.9	31.39	11.35	23.91	
4.9	4.9	31.38	11.35	23.90	
9.9	10.0	31.40	11.34	23.92	
14.9	14.9	32.10	10.84	24.55	
19.9	20.0	32.17	10.34	24.69	
24.9	25.1	32.20	10.06	24.76	6.49
30.4	30.5	32.29	9.66	24.90	
34.7	34.9	32.36	9.41	24.99	
39.7	39.9	32.46	9.11	25.11	
44.6	44.9	32.56	8.85	25.23	
49.6	49.8	32.63	8.62	25.32	3.04
59.8	60.1	32.74	8.33	25.45	
69.6	70.0	32.92	8.21	25.61	
74.6	75.0	33.17	8.13	25.82	4.32
79.5	79.9	33.29	8.08	25.92	
90.5	91.0	33.47	7.93	26.08	
100.4	101.0	33.60	7.81	26.20	3.32
109.3	110.0	33.73	7.65	26.33	
120.3	121.1	33.86	7.25	26.49	
129.3	130.1	33.94	6.83	26.61	
131.2	132.0	33.93	6.81	26.61	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 22.00
DATE 18/ 5/79
TIME (PST) 2003

TAPE: U00454 -104
LONG W 125 34.70
PASS NO. 11
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	31.09	11.61	23.63
2.1	2.1	31.14	11.59	23.67
5.1	5.1	31.13	11.59	23.66
9.9	9.9	31.13	11.60	23.66
14.9	15.0	31.35	11.27	23.89
19.8	19.9	31.79	10.25	24.41
24.9	25.0	32.14	9.37	24.82
29.8	30.0	32.19	9.27	24.88
34.6	34.8	32.24	9.18	24.94
39.7	39.9	32.33	8.92	25.04
44.7	45.0	32.54	8.51	25.27
49.8	50.0	32.62	8.35	25.35
59.7	60.0	32.85	8.19	25.56
70.5	70.9	33.06	8.10	25.74
79.6	80.1	33.17	8.13	25.82
89.6	90.1	33.39	7.87	26.03
99.7	100.3	33.52	7.75	26.15
110.1	110.8	33.59	7.64	26.22
120.3	121.0	33.86	6.81	26.55
130.3	131.1	33.94	6.38	26.67
135.3	136.1	33.95	6.28	26.69

CRUISE NO: 04 CODE
LAT N 48 28.90
DATE 18/ 5/79
TIME (PST) 2141

TAPE: U00454 -105
LONG W 125 21.80
PASS NO. 13
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	29.99	11.71	22.76
2.1	2.1	30.69	11.71	23.30
4.9	4.9	30.70	11.71	23.30
9.9	9.9	31.23	10.41	23.94
15.2	15.2	31.33	10.04	24.08
19.9	20.0	31.50	9.65	24.28
24.8	24.9	31.73	9.05	24.55
29.9	30.0	31.81	8.90	24.64
34.9	35.1	32.06	8.68	24.87
39.7	39.9	32.23	8.52	25.02
44.8	45.0	32.35	8.44	25.13
49.9	50.1	32.37	8.42	25.15
59.6	59.9	32.61	8.28	25.36
69.7	70.0	32.88	8.13	25.59
79.5	80.0	33.14	8.07	25.81
89.4	89.9	33.36	7.89	26.00
100.5	101.0	33.50	7.73	26.14
109.2	109.9	33.58	7.68	26.20
120.3	121.1	33.78	7.14	26.44
130.3	131.1	33.84	7.02	26.51
138.2	139.0	33.87	6.87	26.55

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE TAPE: U00454 -106
LAT N 48 32.20 LONG W 125 15.50
DATE 18/ 5/79 PASS NO. 15
TIME (PST) 2247 STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.8	.9	30.89	11.41	23.51	
2.0	2.0	30.89	11.40	23.51	
5.0	5.0	30.90	11.41	23.51	
10.0	10.0	30.94	11.31	23.56	
15.0	15.1	31.56	9.84	24.29	
19.9	20.0	31.74	9.35	24.52	
25.0	25.1	32.06	8.85	24.84	5.96
29.7	29.8	32.14	8.77	24.92	
35.2	35.4	32.40	8.70	25.13	
39.9	40.1	32.61	8.51	25.32	
45.0	45.2	32.64	8.46	25.35	
50.4	50.7	32.75	8.32	25.46	5.04
59.8	60.1	32.94	8.15	25.63	
69.7	70.1	33.10	8.01	25.79	
74.5	74.9	33.26	7.89	25.92	3.13
80.2	80.7	33.45	7.73	26.10	
90.5	91.0	33.54	7.65	26.18	
91.5	92.1	33.53	7.65	26.18	

CRUISE NO: 04 CODE TAPE: U00454 -107
LAT N 48 35.60 LONG W 125 9.00
DATE 18/ 5/79 PASS NO. 17
TIME (PST) 2355 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	31.37	10.33	24.07
1.8	1.8	31.38	10.34	24.08
5.1	5.1	31.38	10.33	24.08
10.0	10.0	31.57	10.18	24.25
15.0	15.1	31.77	9.76	24.47
20.0	20.1	31.97	9.33	24.70
24.9	25.0	32.14	9.03	24.88
29.9	30.0	32.28	8.76	25.03
34.7	34.9	32.35	8.57	25.11
39.9	40.1	32.40	8.52	25.16
44.8	45.0	32.56	8.43	25.30
49.6	49.9	32.80	8.20	25.52
59.7	60.1	32.96	8.12	25.65
69.7	70.1	33.19	7.92	25.86
79.5	79.9	33.45	7.66	26.11
81.3	81.8	33.50	7.61	26.15

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
TAPE: U00454 -108
LAT N 48 39.00
LONG W 125 2.50
DATE 19/ 5/79
PASS NO. 19
TIME (PST) 0049
STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	31.74	9.98	24.41
2.1	2.1	31.74	9.97	24.41
5.0	5.0	31.75	9.97	24.42
10.0	10.1	32.01	9.20	24.75
15.0	15.1	32.10	8.96	24.85
19.7	19.8	32.25	8.72	25.01
24.8	25.0	32.44	8.52	25.19
29.9	30.1	32.74	8.27	25.46
34.8	35.0	32.90	8.15	25.60
39.8	40.0	33.11	7.99	25.79
39.8	40.0	33.11	7.99	25.79

CRUISE NO: 04 CODE
TAPE: U00454 -109
LAT N 48 25.00
LONG W 125 59.80
DATE 21/ 5/79
PASS NO. 53
TIME (PST) 1009
STN: 201

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.56	11.78	23.96
1.9	1.9	31.56	11.68	23.98
4.9	5.0	31.55	11.80	23.95
9.8	9.8	32.11	10.77	24.57
14.8	14.9	32.32	9.81	24.89
20.2	20.3	32.38	9.58	24.98
24.9	25.0	32.43	9.22	25.07
29.7	29.9	32.50	8.92	25.17
34.9	35.1	32.62	8.60	25.32
39.9	40.1	32.78	8.33	25.48
44.7	44.9	32.86	8.23	25.56
49.7	50.0	32.95	8.18	25.64
59.5	59.8	33.13	8.12	25.79
70.1	70.5	33.33	8.03	25.96
79.5	80.0	33.48	7.93	26.09
90.4	91.0	33.56	7.86	26.17
100.5	101.1	33.67	7.78	26.26
110.4	111.1	33.74	7.70	26.33
120.5	121.3	33.78	7.63	26.37
130.1	131.0	33.84	7.53	26.43
140.1	141.1	33.86	7.43	26.46
150.0	151.0	33.88	7.35	26.49
160.1	161.2	33.90	7.29	26.51
169.9	171.1	33.93	7.12	26.56
179.8	181.0	33.95	6.85	26.61
189.6	190.9	33.95	6.70	26.64
199.6	201.0	33.96	6.55	26.66
222.1	223.7	33.97	6.37	26.69

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 31.50
DATE 21/ 5/79
TIME (PST) 1132

TAPE: U00454 -110
LONG W 126 7.00
PASS NO. 55
STN: 202

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.9	31.61	11.95	23.97
2.0	2.0	31.64	11.80	24.02
5.0	5.0	31.74	11.49	24.15
9.7	9.8	31.83	11.09	24.30
14.8	14.9	31.93	10.99	24.39
20.0	20.1	32.14	10.40	24.65
24.8	24.9	32.29	9.90	24.86
29.7	29.9	32.36	9.70	24.94
34.8	35.0	32.48	8.89	25.16
39.8	40.0	32.61	8.40	25.34
44.7	45.0	32.70	8.19	25.45
49.7	50.0	32.86	8.08	25.58
60.2	60.5	33.21	7.99	25.87
69.5	69.9	33.35	8.00	25.98
79.7	80.1	33.41	7.96	26.04
90.4	90.9	33.48	7.90	26.10
100.3	100.9	33.56	7.80	26.17
110.1	110.8	33.75	7.55	26.36
120.3	121.0	33.81	7.39	26.43
130.1	130.9	33.87	7.20	26.50
140.0	140.9	33.89	7.14	26.53
150.0	151.0	33.89	7.10	26.53
159.9	161.0	33.90	7.03	26.55
169.8	171.0	33.94	6.65	26.63
179.8	181.0	33.96	6.44	26.68
190.2	191.5	33.97	6.28	26.70
199.7	201.1	33.97	6.07	26.73
225.4	227.0	33.98	5.81	26.77
250.1	251.9	34.01	5.47	26.84
275.0	277.0	34.02	5.42	26.85
299.8	302.0	34.02	5.36	26.86
324.6	327.0	34.04	5.25	26.88
330.3	332.9	34.04	5.24	26.89

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04    CODE                              TAPE: U00454    -111
LAT  N 48 35.80                                    LONG W 126 12.70
DATE 21/ 5/79                                      PASS NO. 57
TIME (PST) 1253                                    STN: 203

  DEPTH      PRESS        SAL        TEMP     SIGMA-T
     .2         .2      31.30       12.00      23.72
    2.1        2.1      31.32       11.93      23.75
    5.0        5.0      31.34       11.91      23.77
   10.0       10.0      31.33       11.72      23.79
   14.9       15.0      31.57       11.25      24.07
   19.9       20.0      31.91       10.63      24.44
   25.0       25.1      32.20        9.85      24.79
   29.9       30.1      32.36        9.33      25.00
   34.9       35.0      32.44        9.00      25.11
   39.8       40.0      32.64        8.51      25.35
   44.7       45.0      32.73        8.36      25.44
   49.8       50.1      32.80        8.29      25.51
   60.0       60.3      33.05        8.16      25.72
   69.6       70.0      33.23        8.05      25.88
   79.5       80.0      33.32        7.96      25.96
   90.5       91.0      33.67        7.71      26.27
  100.4      101.0      33.68        7.66      26.29
  110.2      110.9      33.76        7.48      26.38
  120.3      121.0      33.89        7.18      26.52
  130.2      131.0      33.92        7.04      26.56
  140.0      140.9      33.93        6.90      26.59
  150.0      151.0      33.94        6.74      26.62
  160.0      161.0      33.97        6.43      26.69
  164.7      165.8      33.99        6.31      26.72
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 41.40
DATE 21/ 5/79
TIME (PST) 1410

TAPE: U00454 -112
LONG W 126 19.10
PASS NO. 59
STN: 204

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	31.62	11.84	24.00
2.1	2.1	31.71	11.74	24.09
5.0	5.1	31.69	11.73	24.07
10.0	10.1	31.72	11.27	24.18
15.0	15.0	31.82	10.77	24.35
20.0	20.1	32.09	10.05	24.67
24.9	25.0	32.21	9.57	24.84
29.8	29.9	32.40	9.05	25.08
34.9	35.1	32.55	8.59	25.26
39.8	40.0	32.70	8.28	25.43
44.7	44.9	32.78	8.22	25.50
49.7	50.0	32.81	8.23	25.52
59.6	60.0	33.06	8.08	25.74
69.7	70.1	33.32	7.96	25.96
79.5	80.0	33.41	7.90	26.04
90.4	90.9	33.56	7.82	26.17
100.3	100.9	33.64	7.73	26.25
110.3	110.9	33.68	7.68	26.29
120.1	120.9	33.76	7.56	26.36
130.1	130.9	33.84	7.47	26.44
140.1	141.0	33.87	7.28	26.49
150.1	151.1	33.89	7.20	26.52
159.9	161.0	33.91	7.06	26.55
169.9	171.0	33.91	7.04	26.56
179.8	181.0	33.92	7.01	26.57
189.7	191.0	33.92	6.94	26.58
199.7	201.0	33.95	6.75	26.63
225.5	227.1	33.96	6.20	26.71
250.3	252.0	34.00	5.94	26.77
274.9	276.9	34.02	5.62	26.83
299.9	302.1	34.03	5.52	26.85
324.5	327.0	34.04	5.41	26.87
350.2	352.9	34.06	5.33	26.89
375.2	378.1	34.07	5.22	26.91
399.8	402.9	34.09	5.04	26.95
424.5	427.8	34.11	4.88	26.98
450.2	453.8	34.12	4.76	27.01
475.2	479.1	34.12	4.69	27.02
500.0	504.1	34.14	4.64	27.04
511.5	515.7	34.15	4.63	27.04

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  04    CODE
LAT  N 48 48.00                                   TAPE: U00454   -113
DATE 21/ 5/79                                     LONG W 126 26.00
TIME (PST) 1534                                   PASS NO. 61
                                                  STN: 205
 DEPTH      PRESS       SAL        TEMP      SIGMA-T
    .3         .3      31.73      11.86       24.08
   2.1        2.1      31.73      11.55       24.13
   4.8        4.9      31.72      11.60       24.12
  10.0       10.0      31.72      11.40       24.15
  15.0       15.0      31.73      11.09       24.22
  19.8       19.9      31.80      10.89       24.31
  25.0       25.1      32.31       9.67       24.91
  29.9       30.0      32.42       9.30       25.06
  34.8       35.0      32.53       8.75       25.22
  39.8       40.0      32.55       8.55       25.27
  44.7       44.9      32.59       8.45       25.31
  49.7       49.9      32.65       8.30       25.39
  59.7       60.0      32.83       8.08       25.56
  69.7       70.1      32.96       7.96       25.68
  79.7       80.2      33.29       7.93       25.95
  89.5       90.0      33.50       7.80       26.13
 100.3      100.9      33.57       7.80       26.18
 110.3      111.0      33.72       7.68       26.32
 120.3      121.0      33.78       7.59       26.38
 130.2      131.1      33.82       7.47       26.43
 140.1      141.0      33.84       7.43       26.44
 150.0      151.0      33.87       7.28       26.49
 160.0      161.0      33.92       6.99       26.57
 169.9      171.0      33.93       6.82       26.60
 172.5      173.6      33.94       6.78       26.61
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 54.00
DATE 21/ 5/79
TIME (PST) 1650

TAPE: U00454 -114
LONG W 126 33.00
PASS NO. 65
STN: 206

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.43	11.35	23.94
2.1	2.1	31.44	11.31	23.96
4.9	5.0	31.45	11.30	23.96
10.0	10.0	31.43	11.26	23.95
14.9	14.9	31.59	10.54	24.20
19.9	20.0	31.77	10.12	24.41
24.6	24.7	32.06	9.49	24.74
29.8	29.9	32.20	9.29	24.88
34.8	35.0	32.33	9.02	25.03
39.8	40.0	32.57	8.41	25.30
44.7	44.9	32.64	8.28	25.38
49.9	50.1	32.76	8.15	25.49
59.7	60.0	32.90	8.02	25.62
69.7	70.1	33.12	7.96	25.81
79.6	80.0	33.34	7.94	25.98
89.5	90.0	33.48	7.83	26.11
100.3	100.9	33.58	7.81	26.19
110.5	111.1	33.63	7.78	26.23
120.3	121.1	33.73	7.66	26.33
130.1	130.9	33.76	7.57	26.36
139.9	140.8	33.83	7.43	26.44
150.2	151.1	33.86	7.30	26.48
159.9	161.0	33.89	7.17	26.53
169.8	171.0	33.91	7.01	26.56
179.8	181.0	33.93	6.91	26.59
189.7	190.9	33.96	6.58	26.65
199.7	201.1	33.96	6.49	26.67
225.5	227.0	33.97	6.25	26.71
250.3	252.1	33.97	5.95	26.75
275.1	277.1	33.99	5.85	26.77
299.8	302.0	34.01	5.70	26.81
324.7	327.1	34.02	5.63	26.83
350.3	352.9	34.03	5.57	26.84
375.1	378.0	34.05	5.38	26.88
399.9	403.0	34.05	5.34	26.88
408.9	412.0	34.05	5.33	26.89

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04   CODE                              TAPE: U00454   -115
LAT  N 49  1.30                                   LONG W 126 41.80
DATE 21/ 5/79                                     PASS NO. 65
TIME (PST) 1826                                   STN: 207

 DEPTH     PRESS       SAL       TEMP    SIGMA-T
    .9        .9     31.82      11.33     24.24
   2.0       2.0     31.80      11.24     24.25
   5.0       5.0     31.81      11.26     24.25
  10.0      10.1     31.85      11.06     24.32
  15.0      15.0     32.09      10.25     24.64
  19.9      20.0     32.33       9.30     24.99
  25.0      25.1     32.43       8.97     25.11
  29.8      30.0     32.50       8.75     25.20
  34.8      35.0     32.53       8.55     25.26
  39.8      40.0     32.60       8.39     25.33
  44.8      45.0     32.73       8.25     25.45
  49.8      50.1     32.81       8.16     25.53
  59.7      60.0     33.02       8.01     25.72
  69.6      70.0     33.14       7.98     25.82
  80.5      80.9     33.28       7.89     25.94
  90.5      91.0     33.47       7.77     26.11
 100.3     101.0     33.63       7.76     26.23
 110.3     111.0     33.73       7.62     26.34
 120.4     121.1     33.77       7.56     26.37
 130.4     131.3     33.80       7.50     26.41
 140.1     141.0     33.83       7.21     26.47
 150.0     151.0     33.90       6.98     26.56
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE TAPE: U00454 -116
LAT N 49 7.30 LONG W 126 48.90
DATE 21/ 5/79 PASS NO. 67
TIME (PST) 1943 STN: 208

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.9	1.9	31.69	12.19	23.99
5.0	5.0	31.68	11.83	24.05
9.8	9.9	31.75	11.05	24.24
15.0	15.1	32.14	9.92	24.74
19.9	20.0	32.23	9.50	24.87
24.8	24.9	32.33	9.27	24.99
29.7	29.9	32.43	8.61	25.17
34.8	35.0	32.51	8.42	25.26
39.9	40.1	32.64	8.17	25.40
44.8	45.0	32.77	8.01	25.52
49.8	50.1	32.84	7.98	25.58
59.6	60.0	32.96	7.96	25.68
69.6	70.0	33.32	7.86	25.98
80.5	81.0	33.41	7.83	26.05
90.4	91.0	33.58	7.58	26.22
100.5	101.1	33.67	7.46	26.31
110.4	111.0	33.83	7.07	26.49
120.2	121.0	33.90	6.92	26.57
130.2	131.0	33.94	6.69	26.63
140.0	140.9	33.96	6.57	26.66
147.7	148.7	33.96	6.48	26.67

CRUISE NO: 04 CODE TAPE: U00454 -117
LAT N 49 13.70 LONG W 126 57.10
DATE 21/ 5/79 PASS NO. 69
TIME (PST) 2100 STN: 209

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	31.71	11.64	24.10
2.1	2.1	31.68	11.61	24.09
4.9	4.9	31.67	11.65	24.07
10.0	10.0	31.81	11.06	24.29
15.0	15.1	31.92	10.29	24.50
20.0	20.1	32.09	9.55	24.75
24.9	25.0	32.22	9.19	24.91
29.8	29.9	32.33	9.01	25.03
34.8	35.0	32.67	8.42	25.38
39.7	39.9	32.83	8.16	25.55
44.7	44.9	33.02	7.93	25.73
49.7	50.0	33.12	7.89	25.81
59.6	60.0	33.30	7.80	25.97
69.5	69.9	33.46	7.66	26.12
79.6	80.0	33.68	7.45	26.32
90.5	91.0	33.75	7.38	26.38
100.3	101.0	33.77	7.33	26.40
110.3	111.0	33.80	7.31	26.43
120.3	121.1	33.86	7.17	26.50
130.0	130.8	33.89	7.12	26.53
139.1	140.0	33.93	6.95	26.58

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 49 21.53
DATE 21/ 5/79
TIME (PST) 2214

TAPE: U00454 -118
LONG W 127 5.60
PASS NO. 71
STN: 210

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	31.83	11.19	24.28
2.0	2.0	31.85	11.18	24.29
5.0	5.0	31.83	11.20	24.27
9.8	9.9	31.84	11.16	24.29
14.9	15.0	31.94	10.80	24.43
19.8	19.9	32.01	10.40	24.55
24.9	25.0	32.16	9.43	24.83
29.8	30.0	32.26	9.10	24.96
34.9	35.1	32.33	8.89	25.05
39.7	39.9	32.48	8.67	25.20
44.7	45.0	32.65	8.42	25.37
49.8	50.0	32.89	8.06	25.61
59.7	60.0	33.14	7.89	25.83
69.6	70.0	33.41	7.68	26.07
79.5	80.0	33.57	7.50	26.23
89.5	90.0	33.77	7.42	26.39
100.4	101.0	33.80	7.28	26.44
110.3	111.0	33.86	7.12	26.51
120.2	121.0	33.90	6.98	26.56
130.2	131.0	33.91	6.92	26.58
140.1	141.0	33.92	6.86	26.59
150.1	151.1	33.93	6.81	26.60
160.0	161.1	33.94	6.75	26.62
169.9	171.1	33.95	6.69	26.64
179.8	181.0	33.95	6.61	26.65
189.7	191.0	33.96	6.52	26.67
199.6	201.0	33.96	6.49	26.67
225.3	226.9	33.98	6.17	26.72
250.3	252.1	33.98	6.05	26.74
275.1	277.2	34.00	5.80	26.79
299.7	301.9	34.00	5.62	26.81
324.5	326.9	34.00	5.50	26.83
350.2	352.9	34.02	5.36	26.86
375.1	378.0	34.03	5.23	26.88
399.8	402.9	34.05	5.14	26.91
424.6	428.0	34.07	4.95	26.95
450.5	454.1	34.08	4.80	26.97
475.0	478.9	34.10	4.71	26.99
499.9	504.0	34.11	4.61	27.01
499.9	504.0	34.11	4.61	27.01

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE TAPE: U00454 -119
LAT N 49 28.37 LONG W 127 13.72
DATE 21/ 5/79 PASS NO. 73
TIME (PST) 2344 STN: 211

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	32.10	10.97	24.53
2.1	2.1	32.10	10.97	24.53
5.0	5.0	32.09	10.95	24.52
10.0	10.0	32.11	10.92	24.54
14.9	15.0	32.07	10.63	24.56
20.0	20.1	32.06	10.20	24.63
24.9	25.0	32.22	9.70	24.84
29.8	30.0	32.30	9.45	24.94
34.9	35.1	32.38	8.84	25.09
39.8	40.0	32.48	8.47	25.23
44.9	45.1	32.60	8.09	25.38
49.6	49.9	32.69	8.00	25.46
59.7	60.0	32.87	7.71	25.65
69.6	70.0	33.02	7.71	25.76
80.5	81.0	33.27	7.78	25.95
90.4	91.0	33.50	7.72	26.14
100.3	101.0	33.58	7.60	26.22
110.3	111.0	33.70	7.44	26.33
120.3	121.0	33.75	7.37	26.39
130.2	131.0	33.82	7.22	26.46
140.0	140.9	33.85	7.08	26.51
149.9	150.9	33.90	6.91	26.57
159.9	161.0	33.92	6.84	26.59
169.9	171.0	33.94	6.70	26.62
179.7	180.9	33.94	6.63	26.64
189.7	191.0	33.96	6.43	26.68
199.7	201.1	33.98	6.15	26.73
225.5	227.1	33.99	5.86	26.78
250.3	252.1	34.00	5.64	26.81
275.0	277.0	34.00	5.50	26.83
299.9	302.1	34.02	5.48	26.84
324.6	327.0	34.03	5.43	26.86
350.3	353.0	34.04	5.29	26.88
375.1	378.0	34.06	5.09	26.92
399.9	403.0	34.07	4.88	26.95
424.6	428.0	34.08	4.79	26.97
450.3	453.9	34.09	4.70	26.99
475.2	479.1	34.11	4.59	27.02
499.9	504.0	34.13	4.49	27.05
507.8	511.9	34.13	4.48	27.05

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 49 33.64
DATE 22/ 5/79
TIME (PST) 0115

TAPE: U00454 -120
LONG W 127 20.38
PASS NO. 75
STN: 212

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	31.75	11.30	24.20
2.1	2.1	31.81	11.14	24.27
5.0	5.0	31.83	11.16	24.29
9.9	9.9	31.96	10.40	24.51
15.0	15.1	32.03	9.94	24.65
19.8	19.9	32.31	9.17	24.99
24.8	24.9	32.48	8.71	25.19
29.8	29.9	32.62	8.50	25.34
34.9	35.0	32.79	8.25	25.51
39.8	40.1	33.01	8.04	25.70
44.8	45.1	33.09	7.93	25.79
49.7	50.0	33.30	7.70	25.98
59.7	60.1	33.63	7.40	26.29
70.5	70.9	33.78	7.35	26.41
79.7	80.2	33.80	7.35	26.43
90.4	91.0	33.82	7.28	26.46
100.2	100.9	33.82	7.17	26.47
110.2	111.0	33.87	6.89	26.54
120.3	121.1	33.92	6.71	26.61
130.0	130.9	33.94	6.56	26.65
136.0	136.9	33.95	6.49	26.66

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04   CODE
LAT N 49 38.80
DATE 22/ 5/79
TIME (PST) 0236

TAPE: U00454   -121
LONG W 127 27.00
PASS NO. 77
STN: 213

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.1	3.1	31.81	10.90	24.32
4.9	4.9	31.81	10.89	24.31
10.0	10.0	31.80	10.79	24.32
14.8	14.9	31.83	10.51	24.40
19.6	19.7	31.93	10.01	24.56
24.8	24.9	32.43	8.97	25.11
29.7	29.9	32.47	8.86	25.16
35.5	35.7	32.69	8.50	25.39
39.7	39.9	32.80	8.35	25.50
44.8	45.1	33.15	7.84	25.85
49.8	50.1	33.17	7.82	25.87
59.6	60.0	33.53	7.48	26.19
69.7	70.1	33.72	7.25	26.38
80.4	80.9	33.90	6.88	26.57
90.5	91.1	33.92	6.63	26.62
100.3	100.9	33.93	6.51	26.64
110.4	111.1	33.94	6.39	26.67
120.2	121.0	33.95	6.35	26.68
130.2	131.0	33.95	6.30	26.69
140.0	141.0	33.95	6.28	26.69
149.9	150.9	33.95	6.26	26.69
160.0	161.1	33.95	6.25	26.69
169.8	171.0	33.96	6.21	26.70
179.6	180.9	33.96	6.18	26.71
189.6	190.9	33.96	6.13	26.72
199.6	201.0	33.97	6.10	26.73
225.4	227.0	33.99	5.88	26.77
250.2	252.0	34.01	5.55	26.83
275.0	277.1	34.02	5.42	26.85
299.9	302.2	34.02	5.35	26.86
324.6	327.1	34.03	5.33	26.87
350.3	353.0	34.03	5.27	26.88
354.0	356.8	34.04	5.26	26.88

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 49 42.70
DATE 22/ 5/79
TIME (PST) 0328

TAPE: U00454 -122
LONG W 127 32.10
PASS NO. 79
STN: 214

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	31.91	10.80	24.41
2.4	2.4	31.91	10.80	24.40
5.0	5.0	31.91	10.81	24.40
10.1	10.1	31.91	10.79	24.41
15.0	15.1	32.00	10.80	24.48
19.9	20.0	32.00	10.47	24.53
24.9	25.0	32.16	9.71	24.78
29.8	30.0	32.23	9.27	24.91
34.7	34.9	32.31	8.97	25.02
39.8	40.0	32.39	8.88	25.09
44.7	44.9	32.50	8.49	25.24
49.7	50.0	32.62	8.24	25.37
59.6	60.0	32.95	7.91	25.68
69.6	70.0	33.34	7.70	26.02
79.6	80.1	33.54	7.46	26.21
90.5	91.0	33.79	7.05	26.46
100.2	100.8	33.84	7.00	26.51
110.3	111.0	33.91	6.81	26.59
120.4	121.1	33.93	6.69	26.62
130.2	131.0	33.95	6.58	26.65
140.2	141.1	33.96	6.55	26.66
149.9	150.9	33.96	6.46	26.67
159.9	160.9	33.96	6.42	26.68
169.8	171.0	33.97	6.27	26.70
179.9	181.1	33.97	6.20	26.71
189.7	191.0	33.97	6.05	26.73
199.6	201.0	33.98	5.90	26.76
225.4	227.0	34.01	5.64	26.81
250.3	252.1	34.02	5.53	26.84
275.0	277.0	34.03	5.39	26.86
299.8	302.0	34.04	5.23	26.89
325.5	328.0	34.06	5.07	26.92
350.3	353.0	34.06	4.97	26.94
375.0	377.9	34.07	4.85	26.96
399.9	403.1	34.09	4.76	26.98
424.7	428.1	34.09	4.70	26.99
450.5	454.1	34.10	4.68	27.00
475.1	479.0	34.13	4.57	27.03
499.9	504.0	34.15	4.46	27.06
522.7	527.0	34.16	4.40	27.07

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 8.50
DATE 24/ 5/79
TIME (PST) 0247

TAPE: U00454 -148
LONG W 126 .00
PASS NO. 83
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	32.51	11.97	24.66
5.0	5.1	32.51	11.97	24.66
10.0	10.0	32.51	11.96	24.66
15.0	15.0	32.50	11.84	24.68
19.9	20.0	32.55	11.46	24.79
24.7	24.9	32.55	11.27	24.82
29.9	30.0	32.63	9.99	25.10
34.7	34.9	32.65	9.64	25.18
39.7	39.9	32.71	9.14	25.30
44.8	45.1	32.76	9.11	25.35
49.7	50.0	32.78	9.00	25.38
59.7	60.0	32.86	8.83	25.47
69.6	70.0	33.00	8.60	25.61
79.5	80.0	33.29	8.27	25.89
90.4	90.9	33.42	8.08	26.02
100.4	101.0	33.53	8.05	26.12
110.4	111.0	33.63	8.03	26.19
120.2	121.0	33.69	7.83	26.27
130.2	131.0	33.73	7.63	26.33
140.2	141.1	33.79	7.59	26.38
150.0	151.0	33.83	7.48	26.44
160.1	161.1	33.87	7.36	26.48
169.8	170.9	33.90	7.30	26.51
179.8	181.1	33.93	7.12	26.56
189.8	191.0	33.93	6.96	26.58
199.7	201.0	33.94	6.87	26.60
224.6	226.1	33.95	6.68	26.64
250.2	252.0	33.96	6.35	26.68
275.1	277.1	33.97	6.17	26.72
299.9	302.1	33.99	5.94	26.76
324.7	327.1	34.00	5.80	26.79
350.5	353.2	34.02	5.67	26.82
375.0	377.9	34.03	5.53	26.84
400.0	403.1	34.03	5.31	26.87
424.8	428.1	34.06	5.24	26.90
450.4	453.9	34.08	5.10	26.94
475.2	479.0	34.10	4.93	26.97
500.0	504.0	34.12	4.74	27.01
503.7	507.8	34.12	4.72	27.01

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 10.60
DATE 24/ 5/79
TIME (PST) 0333

TAPE: U00454 -149
LONG W 125 56.20
PASS NO. 85
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	32.07	11.42	24.42
4.9	5.0	32.06	11.43	24.42
9.9	10.0	32.23	11.45	24.54
14.9	15.0	32.28	11.23	24.62
19.9	20.0	32.26	11.02	24.64
25.0	25.1	32.28	10.76	24.70
29.5	29.7	32.36	10.20	24.86
34.8	35.0	32.56	9.19	25.18
39.8	40.0	32.61	8.84	25.27
44.7	44.9	32.65	8.64	25.33
49.8	50.0	32.67	8.47	25.37
59.6	60.0	32.76	8.27	25.48
69.5	69.9	32.99	8.16	25.68
79.6	80.0	33.18	7.98	25.85
90.5	91.0	33.41	7.99	26.03
100.3	100.9	33.54	7.89	26.15
110.2	110.9	33.57	7.85	26.18
120.3	121.0	33.67	7.80	26.26
130.4	131.2	33.73	7.70	26.32
140.3	141.2	33.78	7.69	26.37
149.8	150.8	33.85	7.59	26.43
159.9	161.0	33.87	7.49	26.46
169.9	171.0	33.89	7.29	26.51
179.8	181.0	33.90	7.25	26.52
189.8	191.0	33.92	7.15	26.55
199.6	200.9	33.94	7.06	26.58
225.4	227.0	33.97	6.62	26.66
250.3	252.1	33.97	6.30	26.70
275.0	276.9	33.98	6.14	26.73
299.8	302.0	33.99	5.92	26.77
324.6	327.0	34.00	5.73	26.80
350.3	352.9	34.04	5.53	26.85
375.1	377.9	34.04	5.38	26.88
400.0	403.1	34.05	5.24	26.90
424.7	428.0	34.07	5.09	26.93
449.6	453.1	34.08	4.97	26.95
475.0	478.8	34.09	4.87	26.97
500.0	504.0	34.12	4.72	27.01
500.0	504.0	34.12	4.72	27.01

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 12.90
DATE 24/ 5/79
TIME (PST) 0445

TAPE: U00454 -150
LONG W 125 52.00
PASS NO. 87
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.6	.6	31.76	11.76	24.12
2.0	2.0	31.75	11.75	24.11
4.9	4.9	31.75	11.75	24.11
9.9	9.9	31.80	11.63	24.17
14.8	14.9	31.96	11.27	24.37
19.9	20.0	32.03	11.43	24.39
24.8	25.0	32.10	10.90	24.54
29.8	29.9	32.12	10.73	24.59
34.8	35.0	32.41	9.59	25.00
39.8	40.0	32.49	9.12	25.14
44.7	44.9	32.58	8.70	25.27
49.7	50.0	32.68	8.42	25.39
59.6	59.9	32.80	8.32	25.50
69.7	70.1	32.96	8.17	25.65
79.6	80.1	33.15	8.14	25.80
89.5	90.0	33.39	7.97	26.02
99.6	100.2	33.51	7.90	26.12
110.4	111.1	33.62	7.79	26.22
120.5	121.2	33.65	7.76	26.25
130.3	131.1	33.70	7.67	26.30
140.1	141.0	33.75	7.62	26.35
150.0	151.0	33.78	7.53	26.39
160.0	161.1	33.85	7.41	26.46
169.9	171.0	33.89	7.23	26.51
179.8	181.0	33.92	7.07	26.56
189.7	190.9	33.94	6.93	26.60
199.6	200.9	33.95	6.94	26.60
225.5	227.0	33.96	6.69	26.65
250.0	251.8	33.99	6.30	26.72
275.1	277.1	34.00	6.03	26.76
300.0	302.2	34.01	5.81	26.80
324.6	327.0	34.03	5.62	26.83
350.3	352.9	34.05	5.29	26.89
375.1	378.0	34.07	5.11	26.92
399.9	403.0	34.10	4.92	26.97
424.7	428.0	34.10	4.91	26.97
435.6	439.0	34.10	4.89	26.98

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE TAPE: U00454 -151
LAT N 48 15.10 LONG W 125 47.70
DATE 24/ 5/79 PASS NO. 1
TIME (PST) 0528 STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.9	5.0	31.50	12.18	23.84
10.0	10.0	31.49	12.18	23.83
14.9	15.0	31.59	11.90	23.97
20.0	20.1	31.81	11.33	24.23
24.9	25.1	31.93	10.67	24.44
29.9	30.0	32.12	10.06	24.69
34.9	35.1	32.37	9.26	25.02
39.9	40.1	32.46	8.95	25.14
44.7	45.0	32.58	8.66	25.28
49.7	49.9	32.65	8.52	25.36
59.7	60.0	32.82	8.29	25.52
69.7	70.1	32.96	8.10	25.66
79.5	79.9	33.12	8.12	25.78
90.5	91.0	33.25	8.05	25.90
100.3	100.9	33.42	7.97	26.04
110.2	110.9	33.56	7.89	26.16
120.3	121.1	33.69	7.74	26.28
130.3	131.1	33.75	7.64	26.34
140.3	141.1	33.80	7.51	26.40
150.0	151.0	33.84	7.40	26.45
159.9	161.0	33.86	7.30	26.48
169.9	171.0	33.91	7.12	26.54
179.8	181.0	33.91	7.10	26.55
189.7	191.0	33.94	6.96	26.59
199.6	201.0	33.94	6.84	26.61
224.5	226.1	33.95	6.72	26.63
235.0	236.6	33.96	6.57	26.66

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE . TAPE: U00454 -152
LAT N 48 18.60 LONG W 125 41.20
DATE 24/ 5/79 PASS NO. 3
TIME (PST) 0607 STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	31.47	12.17	23.82
2.0	2.0	31.47	12.17	23.82
5.0	5.0	31.47	12.18	23.82
10.0	10.1	31.54	12.18	23.87
15.0	15.1	31.78	11.50	24.19
19.9	20.0	31.86	11.28	24.29
24.9	25.0	31.99	10.83	24.46
29.9	30.0	32.08	10.53	24.58
34.9	35.0	32.22	9.86	24.81
39.8	40.0	32.44	8.50	25.19
44.9	45.1	32.57	8.26	25.33
49.7	50.0	32.67	8.29	25.40
59.7	60.0	32.88	8.17	25.59
69.6	70.0	32.98	8.07	25.68
79.6	80.1	33.27	7.99	25.92
90.5	91.0	33.42	7.92	26.05
100.5	101.0	33.66	7.65	26.28
110.4	111.1	33.68	7.62	26.30
120.3	121.0	33.83	7.36	26.45
130.1	131.0	33.84	7.34	26.46
139.9	140.8	33.90	7.05	26.55
142.1	143.0	33.91	7.04	26.55

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE
LAT N 48 22.00
DATE 24/ 5/79
TIME (PST) 0644

TAPE: U00454 -153
LONG W 125 34.70
PASS NO. 5
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.6	.6	31.16	11.89	23.63
2.0	2.0	31.15	11.88	23.62
4.9	4.9	31.14	11.90	23.61
10.0	10.0	31.49	10.84	24.08
15.0	15.1	31.29	11.25	23.84
20.0	20.0	31.83	9.67	24.53
24.8	24.9	31.92	9.31	24.66
29.9	30.0	32.12	8.97	24.87
34.8	35.0	32.22	8.83	24.97
39.8	40.0	32.48	8.54	25.22
44.9	45.1	32.58	8.40	25.32
49.8	50.0	32.67	8.20	25.42
59.8	60.1	32.82	8.20	25.54
69.5	69.9	33.09	8.14	25.76
79.5	80.0	33.53	7.84	26.15
90.4	90.9	33.61	7.55	26.25
100.4	101.0	33.79	7.06	26.46
110.4	111.1	33.90	6.74	26.59
120.2	121.0	33.92	6.52	26.63
130.2	131.0	33.93	6.49	26.65
140.0	140.9	33.95	6.36	26.68
141.1	142.0	33.95	6.34	26.68

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04    CODE                                TAPE: U00454   -154
LAT  N 48 25.50                                      LONG W 125 28.30
DATE 24/ 5/79                                        PASS NO.  7
TIME (PST) 0722                                      STN: 105

 DEPTH      PRESS       SAL       TEMP     SIGMA-T
    .3         .3      31.36      11.24     23.90
   2.0        2.0      31.36      11.28     23.90
   5.1        5.1      31.38      11.20     23.92
  10.0       10.0      31.53      10.82     24.10
  15.0       15.0      31.84      10.07     24.48
  19.9       20.0      31.87       9.78     24.55
  24.9       25.0      32.05       8.98     24.82
  29.9       30.1      32.21       8.82     24.96
  34.9       35.1      32.31       8.72     25.06
  39.9       40.1      32.40       8.66     25.14
  44.8       45.0      32.47       8.59     25.20
  49.8       50.1      32.61       8.41     25.34
  59.7       60.0      32.80       8.25     25.51
  69.6       70.0      33.09       8.06     25.77
  80.4       80.9      33.30       8.00     25.94
  89.6       90.1      33.74       7.24     26.39
 100.5      101.1      33.85       6.87     26.53
 110.4      111.1      33.92       6.57     26.63
 113.3      114.0      33.92       6.55     26.63

CRUISE NO:  04    CODE                               TAPE: U00454   -155
LAT  N 48 28.90                                      LONG W 125 21.80
DATE 24/ 5/79                                        PASS NO.  9
TIME (PST) 0759                                      STN: 104

 DEPTH      PRESS       SAL       TEMP     SIGMA-T
    .5         .5      30.97      12.07     23.45
   2.3        2.3      30.98      12.05     23.46
   4.9        4.9      30.98      12.04     23.46
  10.0       10.0      31.36      10.90     23.96
  15.0       15.0      31.69       9.95     24.38
  20.0       20.1      31.86       9.47     24.59
  24.8       24.9      32.05       9.02     24.81
  29.8       30.0      32.27       8.86     25.00
  34.8       35.0      32.35       8.75     25.08
  39.9       40.1      32.49       8.50     25.23
  44.8       45.1      32.57       8.44     25.31
  49.8       50.1      32.74       8.30     25.46
  59.6       59.9      32.90       8.23     25.60
  69.6       70.0      33.24       7.98     25.90
  79.5       80.0      33.36       7.86     26.01
  90.4       90.9      33.51       7.65     26.15
 100.3      100.9      33.66       7.43     26.31
 110.4      111.1      33.79       7.15     26.44
 120.2      120.9      33.83       6.99     26.50
 130.1      130.9      33.89       6.75     26.58
 140.1      141.0      33.90       6.68     26.60
 141.9      142.8      33.90       6.68     26.60
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04 CODE TAPE: U00454 -156
LAT N 48 32.20 LONG W 125 15.50
DATE 24/ 5/79 PASS NO. 11
TIME (PST) 0838 STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	30.24	12.32	22.84
2.1	2.1	30.24	12.25	22.86
5.0	5.0	30.28	12.30	22.88
10.0	10.0	31.32	11.21	23.88
15.1	15.1	31.56	10.52	24.18
19.9	20.0	31.83	9.76	24.52
24.9	25.0	31.96	9.47	24.67
29.8	29.9	32.11	9.15	24.84
34.7	34.8	32.14	9.05	24.88
39.8	40.0	32.28	8.88	25.01
44.8	45.0	32.44	8.68	25.17
49.9	50.2	32.50	8.60	25.22
59.7	60.0	32.70	8.38	25.41
69.5	69.9	32.93	8.27	25.61
79.6	80.0	33.03	8.17	25.70
90.5	91.0	33.53	7.55	26.18
99.5	100.1	33.66	7.32	26.32
110.2	110.9	33.67	7.30	26.34
114.3	115.0	33.67	7.30	26.33

CRUISE NO: 04 CODE TAPE: U00454 -157
LAT N 48 35.60 LONG W 125 9.00
DATE 24/ 5/79 PASS NO. 13
TIME (PST) 0919 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.9	.9	31.88	10.42	24.45
2.1	2.1	31.89	10.38	24.46
5.0	5.0	31.90	10.02	24.54
10.0	10.0	32.01	9.62	24.68
15.1	15.1	32.02	9.34	24.74
19.9	20.0	32.05	9.07	24.80
24.8	25.0	32.13	8.90	24.89
29.8	30.0	32.16	8.86	24.92
34.8	35.0	32.18	8.85	24.93
39.8	40.0	32.21	8.80	24.97
44.9	45.2	32.32	8.68	25.07
49.9	50.2	32.46	8.46	25.22
59.6	60.0	32.72	8.19	25.46
69.6	70.0	32.94	8.03	25.65
79.6	80.1	33.03	7.95	25.73
90.5	91.0	33.42	7.55	26.10
91.3	91.8	33.43	7.55	26.11

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 04   CODE                              TAPE: U00454   -158
LAT  N 48 39.00                                   LONG W 125  2.50
DATE 24/ 5/79                                     PASS NO. 15
TIME (PST) 1003                                   STN: 101

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .2         .2     31.55      11.28     24.04
   2.0        2.0     31.60      11.00     24.13
   5.0        5.1     31.66      10.91     24.19
   9.9       10.0     32.04       9.54     24.72
  15.0       15.1     32.10       9.12     24.83
  19.8       19.9     32.16       8.88     24.91
  24.9       25.0     32.17       8.84     24.93
  29.9       30.0     32.17       8.83     24.93
  34.8       35.0     32.18       8.81     24.94
  39.8       40.0     32.20       8.77     24.97
  44.9       45.1     32.26       8.70     25.02
  44.9       45.1     32.26       8.70     25.02
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 05 CODE
LAT N 48 12.90
DATE 21/ 6/79
TIME (PST) 0028

TAPE: U00454 -159
LONG W 125 52.00
PASS NO. 33
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	32.20	13.07	24.22
2.1	2.1	32.19	13.05	24.21
4.9	5.0	32.18	13.17	24.18
10.1	10.1	32.19	13.16	24.19
15.0	15.0	32.22	12.01	24.43
19.9	20.0	32.20	11.61	24.49
25.0	25.1	32.23	11.09	24.61
29.8	29.9	32.31	10.25	24.81
34.8	35.0	32.49	8.67	25.20
39.7	39.9	32.60	8.38	25.34
44.8	45.0	32.64	8.30	25.38
49.8	50.0	32.74	8.02	25.50
59.8	60.1	33.03	7.66	25.78
69.6	70.0	33.36	7.75	26.02
79.6	80.0	33.51	7.69	26.15
90.5	91.0	33.65	7.62	26.27
100.4	101.1	33.75	7.57	26.36
110.4	111.1	33.82	7.47	26.42
120.1	120.9	33.82	7.44	26.43
130.2	131.1	33.83	7.39	26.45
140.2	141.1	33.88	7.35	26.49
150.1	151.1	33.91	7.31	26.52
159.9	161.0	33.92	7.24	26.53
169.9	171.1	33.95	7.10	26.58
179.7	180.9	33.96	6.95	26.61
189.8	191.1	33.96	6.78	26.63
199.5	200.9	33.96	6.55	26.66
225.4	227.0	33.98	6.34	26.71
250.2	252.0	33.98	6.14	26.73
274.9	276.9	33.99	5.91	26.76
299.8	302.0	34.02	5.71	26.81
324.6	327.1	34.03	5.48	26.85
350.4	353.0	34.04	5.36	26.88
375.2	378.1	34.06	5.27	26.90
399.9	403.0	34.09	5.22	26.93
417.5	420.8	34.09	5.16	26.93

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 05   CODE                             TAPE: U00454   -160
LAT  N 48 15.10                                  LONG W 125 47.70
DATE 22/ 6/79                                    PASS NO. 35
TIME (PST) 0116                                  STN: 108

 DEPTH      PRESS       SAL       TEMP     SIGMA-T
    .6         .6     32.09      13.27      24.09
   2.1        2.1     32.11      13.25      24.11
   4.9        4.9     32.11      13.25      24.11
  10.0       10.0     32.12      13.04      24.16
  14.8       14.9     32.15      12.42      24.30
  19.9       20.0     32.36       9.99      24.89
  24.9       25.0     32.46       9.05      25.12
  29.8       29.9     32.56       8.41      25.30
  34.9       35.1     32.58       8.36      25.32
  40.0       40.2     32.61       8.26      25.36
  44.8       45.1     32.66       8.15      25.42
  49.8       50.1     32.75       8.03      25.50
  59.7       60.1     33.07       7.74      25.80
  69.6       70.0     33.24       7.69      25.94
  80.4       80.9     33.56       7.57      26.21
  90.5       91.0     33.65       7.55      26.28
 100.3      100.9     33.76       7.41      26.39
 110.3      111.0     33.82       7.32      26.45
 120.1      120.9     33.88       7.15      26.52
 130.0      130.9     33.87       7.14      26.51
 140.1      141.1     33.92       6.98      26.57
 150.1      151.1     33.93       6.91      26.59
 159.8      160.9     33.95       6.88      26.61
 169.8      170.9     33.95       6.86      26.62
 179.7      181.0     33.96       6.77      26.63
 190.2      191.5     33.96       6.62      26.66
 199.7      201.1     33.96       6.50      26.67
 209.3      210.7     33.96       6.48      26.67
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 05 CODE
LAT N 48 18.60
DATE 22/ 6/79
TIME (PST) 0202

TAPE: U00454 -161
LONG W 125 41.20
PASS NO. 37
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	31.92	12.87	24.03
2.0	2.0	31.91	12.69	24.06
5.0	5.0	31.90	12.56	24.08
9.9	10.0	31.94	12.63	24.10
14.9	15.0	31.96	11.70	24.29
19.9	20.0	32.17	10.49	24.66
24.9	25.0	32.51	8.91	25.18
29.8	30.0	32.59	8.51	25.31
34.9	35.0	32.65	8.35	25.38
40.0	40.2	32.81	8.11	25.54
44.8	45.0	32.95	7.98	25.67
49.6	49.9	33.10	7.87	25.80
59.6	60.0	33.43	7.61	26.10
69.7	70.1	33.58	7.49	26.23
79.5	80.0	33.76	7.37	26.39
89.5	90.1	33.79	7.34	26.42
100.6	101.3	33.85	7.26	26.48
110.3	111.0	33.88	7.18	26.51
120.2	121.0	33.90	7.08	26.55
130.3	131.1	33.92	6.95	26.58
140.1	141.1	33.93	6.69	26.62
145.8	146.8	33.95	6.68	26.63

```
COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 05    CODE                              TAPE: U00454    -162
LAT   N 48 22.00                                   LONG W 125 34.70
DATE 22/ 6/79                                      PASS NO. 39
TIME (PST) 0245                                    STN: 106

 DEPTH      PRESS        SAL        TEMP     SIGMA-T
   1.9        1.9       32.02      12.54      24.17
   4.9        4.9       32.01      12.54      24.17
   9.9       10.0       32.02      11.17      24.43
  14.8       14.9       32.09       9.86      24.71
  20.0       20.1       32.14       9.39      24.82
  24.9       25.0       32.29       9.07      24.99
  29.9       30.1       32.44       8.76      25.16
  34.8       35.0       32.60       8.54      25.31
  39.8       40.0       32.80       8.31      25.50
  44.7       44.9       32.91       8.30      25.59
  49.8       50.0       33.07       8.07      25.75
  59.8       60.1       33.30       7.73      25.98
  69.6       70.0       33.45       7.48      26.13
  80.4       80.9       33.53       7.32      26.22
  90.5       91.0       33.66       7.16      26.35
 100.3      100.9       33.81       6.82      26.51
 110.2      110.9       33.88       6.61      26.59
 120.3      121.1       33.93       6.43      26.65
 130.0      130.9       33.94       6.39      26.67
 140.1      141.0       33.95       6.34      26.68
 142.0      142.9       33.96       6.32      26.69

CRUISE NO:  05    CODE                             TAPE: U00454    -163
LAT   N 48 25.50                                   LONG W 125 28.30
DATE 22/ 6/79                                      PASS NO. 41
TIME (PST) 0332                                    STN: 105

 DEPTH      PRESS        SAL        TEMP     SIGMA-T
   4.9        5.0       32.38      10.86      24.76
  10.0       10.0       32.42       9.99      24.94
  14.9       15.0       32.48       9.54      25.06
  19.9       20.0       32.63       9.07      25.25
  24.8       25.0       32.85       8.52      25.51
  29.8       30.0       32.97       8.16      25.66
  34.8       35.0       33.06       8.03      25.75
  39.9       40.1       33.14       7.88      25.83
  44.8       45.1       33.27       7.72      25.95
  49.7       50.0       33.30       7.68      25.99
  59.7       60.1       33.37       7.59      26.06
  69.6       70.0       33.47       7.42      26.16
  79.5       80.0       33.64       7.12      26.33
  90.4       91.0       33.66       7.09      26.36
 100.2      100.9       33.74       6.92      26.44
 110.4      111.1       33.81       6.75      26.52
 120.2      121.0       33.88       6.54      26.60
 130.1      131.0       33.92       6.38      26.65
 130.7      131.6       33.92       6.38      26.65
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 05 CODE
LAT N 48 28.90
DATE 22/ 6/79
TIME (PST) 0414

TAPE: U00454 -164
LONG W 125 21.80
PASS NO. 43
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	32.18	11.36	24.52
5.0	5.0	32.18	11.08	24.57
9.9	9.9	32.43	10.28	24.90
15.0	15.0	32.66	9.20	25.26
20.0	20.1	32.85	8.68	25.49
24.8	24.9	32.93	8.45	25.59
29.7	29.9	33.02	8.29	25.68
34.7	34.9	33.23	7.91	25.90
39.8	40.1	33.41	7.59	26.08
45.0	45.2	33.45	7.51	26.13
49.7	50.0	33.50	7.40	26.19
59.7	60.1	33.69	7.01	26.39
70.5	71.0	33.77	6.83	26.48
80.5	81.0	33.83	6.67	26.54
89.4	90.0	33.86	6.56	26.58
100.4	101.1	33.88	6.52	26.60
110.3	111.1	33.91	6.42	26.64
120.0	120.9	33.92	6.35	26.66
130.0	130.9	33.94	6.29	26.68
140.0	141.0	33.95	6.25	26.69
149.9	151.0	33.95	6.24	26.69
151.9	152.9	33.94	6.25	26.69

CRUISE NO: 05 CODE
LAT N 48 32.20
DATE 22/ 6/79
TIME (PST) 0504

TAPE: U00454 -165
LONG W 125 15.50
PASS NO. 45
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	32.21	11.86	24.45
2.0	2.0	32.22	11.85	24.46
4.9	5.0	32.25	11.80	24.49
10.0	10.0	32.42	10.86	24.80
14.9	15.0	32.54	9.86	25.06
19.9	20.0	32.73	9.07	25.33
25.0	25.2	32.82	8.83	25.44
29.8	30.0	33.07	8.32	25.72
34.8	35.0	33.13	8.19	25.78
39.9	40.1	33.31	7.81	25.98
44.9	45.1	33.40	7.60	26.08
49.8	50.1	33.49	7.44	26.17
59.6	60.0	33.59	7.23	26.28
69.7	70.1	33.73	6.93	26.43
80.3	80.8	33.84	6.64	26.56
90.4	91.0	33.87	6.56	26.59
100.3	101.0	33.88	6.50	26.61
110.3	111.1	33.90	6.46	26.63
112.9	113.7	33.90	6.46	26.62

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 05 CODE TAPE: U00454 -166
LAT N 48 35.60 LONG W 125 9.00
DATE 22/ 6/79 PASS NO. 47
TIME (PST) 0551 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	32.01	10.33	24.57
4.9	5.0	32.03	10.25	24.59
10.0	10.0	32.04	10.02	24.64
15.5	15.6	32.28	9.25	24.95
20.1	20.2	32.42	9.13	25.08
25.0	25.1	32.46	9.15	25.11
30.0	30.1	32.50	8.89	25.18
34.9	35.1	32.64	8.62	25.33
39.7	39.9	32.70	8.36	25.42
44.6	44.9	32.76	8.25	25.48
49.6	49.9	32.86	8.11	25.58
59.5	59.9	33.16	7.85	25.85
69.5	69.9	33.32	7.65	26.01
79.5	80.0	33.60	7.12	26.30
90.4	91.0	33.66	7.00	26.36
100.3	100.9	33.77	6.81	26.47
109.0	109.7	33.79	6.76	26.50

CRUISE NO: 05 CODE TAPE: U00454 -167
LAT N 48 39.00 LONG W 125 2.50
DATE 22/ 6/79 PASS NO. 49
TIME (PST) 0643 STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.9	.9	32.02	10.03	24.62
2.1	2.1	32.04	10.01	24.65
4.9	4.9	32.05	10.00	24.65
10.4	10.4	32.04	10.01	24.64
15.0	15.1	32.05	9.93	24.66
19.9	20.0	32.05	9.87	24.67
24.9	25.0	32.18	9.15	24.89
29.9	30.1	32.19	9.04	24.91
34.9	35.0	32.22	8.99	24.94
39.8	40.0	32.43	8.66	25.16
44.7	44.9	32.52	8.55	25.24
49.8	50.1	32.56	8.49	25.29
51.9	52.2	32.55	8.50	25.28

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07   CODE
LAT N 48 8.50
DATE 12/10/79
TIME (PST) 2111

TAPE: U00454   -186
LONG W 126   .00
PASS NO. 1
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	32.27	16.26	23.60	
2.8	2.9	32.27	16.26	23.59	
5.1	5.1	32.27	16.26	23.59	
10.0	10.1	32.27	16.26	23.59	
14.8	14.8	32.27	16.26	23.60	
19.7	19.8	32.30	15.99	23.68	
24.9	25.0	32.42	13.36	24.32	6.43
29.9	30.0	32.56	10.64	24.94	
34.9	35.0	32.59	10.39	25.01	
39.9	40.1	32.69	10.26	25.11	
44.6	44.8	32.71	9.65	25.22	
49.7	50.0	32.72	9.19	25.31	6.63
59.7	60.1	32.80	8.68	25.44	
69.6	70.0	32.95	8.45	25.60	
74.7	75.1	33.02	8.39	25.67	5.31
79.6	80.0	33.11	8.28	25.75	
90.5	91.0	33.24	8.17	25.86	
100.1	100.7	33.41	7.92	26.04	4.39
110.5	111.1	33.54	7.80	26.16	
120.3	121.0	33.62	7.72	26.24	
125.3	126.0	33.67	7.71	26.27	3.76
130.2	131.0	33.70	7.71	26.30	
140.2	141.0	33.78	7.56	26.38	
150.1	151.1	33.82	7.51	26.42	3.27
160.3	161.3	33.85	7.45	26.45	
169.9	171.0	33.87	7.34	26.48	
179.8	181.0	33.88	7.33	26.50	
189.8	191.1	33.89	7.26	26.51	
199.7	201.0	33.92	7.21	26.54	3.06
225.4	226.9	33.95	6.94	26.60	
250.2	252.0	33.96	6.66	26.65	2.84
275.0	277.0	33.98	6.45	26.69	
299.7	301.8	33.99	6.22	26.73	2.23
324.7	327.0	34.00	5.94	26.77	
350.3	352.9	34.02	5.75	26.81	
375.1	377.9	34.04	5.64	26.84	
399.9	403.0	34.04	5.46	26.86	
424.8	428.1	34.05	5.25	26.90	
450.4	453.9	34.08	5.18	26.92	
475.3	479.1	34.09	5.08	26.95	
496.9	500.9	34.11	4.98	26.97	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  07   CODE                           TAPE: U00454   -187
LAT  N 48 10.60                                 LONG W 125 56.20
DATE 12/10/79                                   PASS NO.  3
TIME (PST) 2243                                 STN: 110

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
   1.9        1.9      32.24      16.16      23.59
   5.0        5.0      32.23      16.16      23.59
  10.0       10.1      32.23      16.16      23.59
  14.9       15.0      32.24      16.16      23.59
  20.0       20.1      32.25      16.14      23.61
  24.8       24.9      32.53      12.04      24.67
  29.9       30.0      32.63      11.21      24.90
  34.9       35.1      32.66      10.08      25.11
  39.7       39.9      32.68       9.79      25.18
  44.7       44.9      32.71       9.23      25.29
  49.7       49.9      32.76       8.75      25.40
  59.7       60.0      32.90       8.33      25.58
  69.5       69.9      33.06       8.13      25.73
  79.5       80.0      33.20       7.99      25.87
  90.4       90.9      33.37       7.78      26.03
 100.5      101.1      33.42       7.74      26.07
 110.3      111.0      33.61       7.62      26.24
 120.3      121.0      33.70       7.54      26.32
 130.2      131.0      33.76       7.49      26.37
 140.2      141.1      33.78       7.46      26.40
 150.0      151.0      33.82       7.40      26.44
 160.1      161.1      33.86       7.30      26.48
 169.9      171.0      33.88       7.21      26.51
 179.8      181.0      33.91       7.19      26.54
 189.6      190.9      33.93       7.13      26.56
 199.7      201.0      33.94       7.08      26.57
 224.6      226.1      33.96       6.84      26.63
 250.2      252.0      33.98       6.60      26.67
 275.0      277.0      33.99       6.40      26.70
 299.7      301.9      33.99       6.24      26.73
 324.6      327.0      34.01       6.11      26.76
 350.3      353.0      34.02       5.74      26.81
 375.2      378.0      34.03       5.61      26.84
 399.9      402.9      34.05       5.39      26.88
 424.8      428.1      34.06       5.25      26.91
 449.6      453.1      34.08       5.12      26.93
 475.2      479.0      34.10       5.04      26.96
 497.7      501.7      34.12       4.94      26.99
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07 CODE
LAT N 48 12.90
DATE 12/10/79
TIME (PST) 2336

TAPE: U00454 -188
LONG W 125 52.00
PASS NO. 5
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.3	2.3	32.23	16.16	23.59	
5.0	5.0	32.23	16.17	23.58	
9.8	9.9	32.23	16.17	23.58	
15.0	15.1	32.47	13.71	24.30	
19.9	20.0	32.69	12.20	24.76	
25.0	25.1	32.72	10.50	25.09	7.60
29.9	30.0	32.69	9.89	25.17	
34.9	35.0	32.71	9.59	25.23	
39.7	39.9	32.71	9.08	25.32	
44.7	45.0	32.74	8.84	25.38	
49.8	50.1	32.76	8.64	25.42	5.99
59.7	60.1	32.79	8.59	25.45	
69.6	70.0	33.00	8.13	25.69	
75.4	75.8	33.07	8.06	25.75	5.14
79.5	79.9	33.13	7.97	25.81	
90.5	91.0	33.32	7.82	25.98	
100.6	101.2	33.47	7.70	26.12	3.97
110.3	111.0	33.56	7.62	26.20	
120.2	120.9	33.64	7.64	26.26	
125.2	126.0	33.69	7.63	26.30	3.34
130.2	131.0	33.74	7.59	26.34	
140.0	140.9	33.81	7.47	26.42	
150.1	151.1	33.84	7.33	26.46	2.41
159.9	161.0	33.86	7.30	26.48	
169.8	170.9	33.88	7.25	26.51	
179.8	181.0	33.90	7.18	26.53	
189.7	191.0	33.92	7.15	26.55	
199.6	200.9	33.94	7.08	26.58	2.86
225.5	227.1	33.97	6.83	26.63	
250.3	252.0	33.99	6.63	26.67	2.29
275.1	277.1	33.99	6.39	26.71	
299.8	302.0	33.99	6.26	26.73	2.04
324.7	327.1	34.00	6.11	26.75	
350.4	353.0	34.01	6.01	26.77	
375.3	378.1	34.02	5.81	26.80	
399.9	403.0	34.03	5.62	26.84	
424.6	427.9	34.04	5.52	26.85	
450.4	454.0	34.05	5.32	26.89	1.28
475.3	479.1	34.08	5.16	26.93	
499.7	503.7	34.11	4.95	26.98	
499.7	503.7	34.11	4.95	26.98	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07 CODE
LAT N 48 15.10
DATE 13/10/79
TIME (PST) 0113

TAPE: U00454 -189
LONG W 125 47.70
PASS NO. 8
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	32.36	16.19	23.68
2.0	2.0	32.37	16.19	23.69
5.0	5.0	32.37	16.19	23.69
9.9	9.9	32.37	16.19	23.69
15.0	15.1	32.37	16.19	23.69
19.8	19.9	32.34	15.88	23.73
24.9	25.0	32.67	11.88	24.81
29.9	30.0	32.66	10.78	25.00
34.8	34.9	32.66	10.46	25.05
39.8	40.0	32.70	9.49	25.24
44.8	45.0	32.71	9.31	25.28
49.8	50.0	32.74	8.93	25.36
59.7	60.0	32.89	8.38	25.56
70.3	70.7	33.01	8.17	25.69
79.5	80.0	33.27	7.87	25.93
89.6	90.1	33.40	7.78	26.06
100.5	101.1	33.53	7.69	26.17
110.2	110.9	33.66	7.62	26.28
120.2	120.9	33.69	7.60	26.31
130.1	130.9	33.71	7.58	26.32
140.2	141.1	33.78	7.47	26.39
150.1	151.0	33.82	7.39	26.43
160.0	161.0	33.83	7.37	26.45
169.8	170.9	33.85	7.25	26.48
180.7	181.9	33.87	7.13	26.51
189.7	191.0	33.88	7.11	26.52
199.6	200.9	33.88	7.11	26.52
225.4	226.9	33.92	6.90	26.59
225.4	226.9	33.92	6.90	26.59

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07 CODE
LAT N 48 18.60
DATE 13/10/79
TIME (PST) 0203

TAPE: U00454 -190
LONG W 125 41.20
PASS NO. 10
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.1	.1	31.97	14.97	23.64	
2.0	2.0	31.97	14.97	23.65	
5.0	5.0	31.98	14.97	23.65	
9.9	9.9	32.08	15.17	23.69	
15.0	15.0	32.08	14.68	23.79	
19.9	20.0	32.23	13.01	24.25	
25.0	25.1	32.37	11.39	24.66	6.00
30.0	30.1	32.46	10.20	24.94	
34.8	35.0	32.59	9.18	25.20	
39.8	40.0	32.70	8.65	25.37	
44.8	45.0	32.77	8.40	25.46	
49.7	49.9	32.85	8.24	25.56	5.29
59.7	60.0	32.94	8.13	25.64	
69.6	70.0	33.12	7.97	25.80	
74.6	75.0	33.17	7.94	25.85	4.70
79.5	79.9	33.25	7.86	25.92	
90.5	91.1	33.43	7.68	26.09	
100.3	100.9	33.53	7.65	26.18	3.96
110.1	110.8	33.61	7.63	26.24	
120.2	120.9	33.68	7.60	26.30	
125.2	126.0	33.71	7.53	26.33	3.22
130.2	131.1	33.76	7.48	26.38	
140.1	140.9	33.86	7.24	26.49	
149.9	150.9	33.88	7.12	26.53	2.58
154.1	155.1	33.89	7.07	26.54	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07   CODE                          TAPE: U00454   -191
LAT  N 48 22.00                               LONG W 125 34.70
DATE 13/10/79                                 PASS NO. 12
TIME (PST) 0310                               STN: 106

 DEPTH     PRESS      SAL      TEMP    SIGMA-T
    .4        .4     32.23     12.71    24.31
   2.1       2.1     32.24     12.70    24.32
   4.7       4.8     32.24     12.68    24.32
   9.9      10.0     32.25     12.16    24.43
  14.8      14.9     32.31     11.66    24.57
  19.9      20.0     32.54     10.47    24.95
  24.9      25.0     32.53     10.09    25.01
  29.9      30.0     32.70      9.56    25.23
  34.7      34.9     32.82      9.09    25.40
  39.8      40.0     32.89      8.64    25.52
  44.9      45.1     33.02      8.36    25.67
  49.7      49.9     33.06      8.08    25.74
  59.7      60.0     33.35      7.97    25.99
  69.7      70.1     33.48      7.65    26.13
  79.6      80.1     33.61      7.42    26.26
  89.6      90.1     33.67      7.26    26.34
 100.3     100.9     33.76      7.19    26.42
 110.3     111.0     33.82      7.20    26.46
 120.3     121.0     33.88      7.10    26.52
 130.1     131.0     33.90      7.06    26.55
 140.1     141.0     33.90      7.05    26.55
 148.9     149.9     33.90      7.04    26.55
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07   CODE
LAT N 48 25.50
DATE 13/10/79
TIME (PST) 0353

TAPE: U00454   -192
LONG W 125 28.30
PASS NO. 14
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.5	.5	32.28	12.65	24.36	
1.6	1.6	32.29	12.64	24.37	
5.0	5.0	32.27	12.65	24.35	
10.6	10.6	32.38	11.66	24.62	
15.0	15.0	32.44	10.96	24.79	
19.9	20.0	32.54	10.43	24.96	
24.8	25.0	32.65	9.90	25.14	3.84
29.8	30.0	32.91	9.05	25.48	
34.9	35.1	33.00	8.78	25.59	
39.9	40.1	33.15	8.41	25.77	
44.6	44.9	33.28	8.14	25.90	
49.6	49.9	33.42	7.83	26.06	2.59
59.7	60.0	33.61	7.42	26.27	
69.6	70.1	33.66	7.32	26.32	
74.5	75.0	33.68	7.27	26.35	2.09
79.5	80.0	33.70	7.24	26.36	
90.4	91.0	33.71	7.21	26.38	
100.4	101.0	33.75	7.14	26.41	1.92
110.2	110.9	33.79	7.05	26.46	
120.3	121.1	33.81	7.02	26.48	
125.3	126.2	33.82	7.01	26.49	1.66
130.2	131.0	33.82	6.99	26.49	
130.2	131.0	33.82	6.99	26.49	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07   CODE                              TAPE: U00454   -193
LAT  N 48 28.90                                   LONG W 125 21.80
DATE 13/10/79                                     PASS NO. 16
TIME (PST) 0453                                   STN: 104

 DEPTH     PRESS       SAL       TEMP    SIGMA-T
    .3        .3     32.19      12.39     24.34
   2.0       2.0     32.20      12.35     24.35
   4.9       4.9     32.19      12.36     24.34
  10.2      10.3     32.30      11.21     24.64
  15.0      15.1     32.41      10.31     24.88
  20.1      20.2     32.59       9.77     25.11
  25.5      25.6     32.77       9.42     25.31
  29.8      29.9     32.84       9.24     25.39
  34.8      35.0     33.00       8.83     25.58
  39.5      39.8     33.08       8.64     25.67
  44.8      45.0     33.20       8.34     25.81
  49.7      50.0     33.31       8.08     25.93
  59.6      60.0     33.53       7.56     26.19
  69.5      69.9     33.63       7.35     26.30
  80.4      80.9     33.72       7.17     26.39
  90.3      90.9     33.79       7.04     26.46
 100.3     100.9     33.85       7.00     26.52
 110.4     111.1     33.86       6.98     26.53
 120.3     121.1     33.87       6.90     26.54
 130.2     131.0     33.88       6.88     26.55
 140.1     141.1     33.88       6.88     26.56
 148.9     149.9     33.88       6.88     26.56
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07   CODE                                 TAPE: U00454   -194
LAT  N 48 32.20                                      LONG W 125 15.50
DATE 13/10/79                                        PASS NO. 18
TIME (PST) 0508                                      STN: 103

 DEPTH      PRESS      SAL       TEMP     SIGMA-T   OXYGEN
    .9         .9     32.47     11.19     24.78
   2.0        2.0     32.42     11.06     24.76
   5.1        5.2     32.38     10.86     24.76
  10.0       10.0     32.54     10.57     24.94
  14.6       14.7     32.68      9.60     25.21
  19.8       19.9     32.75      9.39     25.30
  24.9       25.0     32.79      9.29     25.34    4.16
  29.8       30.0     32.82      9.15     25.39
  34.8       35.0     32.93      8.82     25.52
  39.7       39.9     32.99      8.63     25.60
  44.7       44.9     33.06      8.47     25.68
  49.9       50.2     33.11      8.36     25.74    4.13
  59.6       60.0     33.24      8.05     25.89
  69.5       70.0     33.44      7.68     26.10
  75.5       76.0     33.47      7.64     26.13    3.54
  80.5       81.0     33.57      7.50     26.23
  90.6       91.2     33.67      7.33     26.33
 100.4      101.0     33.73      7.23     26.39    2.28
 110.4      111.1     33.79      7.10     26.46
 114.3      115.0     33.79      7.10     26.46

CRUISE NO:  07   CODE                                TAPE: U00454   -195
LAT  N 48 35.60                                      LONG W 125  9.00
DATE 13/10/79                                        PASS NO. 20
TIME (PST) 0646                                      STN: 102

 DEPTH      PRESS      SAL       TEMP     SIGMA-T
    .9         .9     32.51     10.10     24.99
   2.0        2.0     32.52     10.09     25.00
   5.1        5.2     32.53     10.02     25.02
   9.9       10.0     32.52     10.05     25.01
  14.8       14.9     32.61      9.74     25.13
  20.0       20.1     32.68      9.44     25.23
  24.9       25.0     32.75      9.14     25.34
  29.9       30.1     32.76      9.10     25.35
  34.9       35.1     32.78      9.03     25.38
  39.7       40.0     32.79      9.01     25.39
  44.5       44.7     32.84      8.96     25.44
  49.7       50.0     32.88      8.86     25.48
  59.7       60.0     33.04      8.59     25.65
  69.5       69.9     33.14      8.40     25.76
  79.6       80.0     33.31      7.97     25.95
  89.5       90.0     33.58      7.49     26.23
 100.3      100.9     33.67      7.33     26.33
 110.0      110.7     33.69      7.31     26.34
 110.0      110.7     33.69      7.31     26.34
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 07 CODE TAPE: U00454 -196
LAT N 48 39.00 LONG W 125 2.50
DATE 13/10/79 PASS NO. 22
TIME (PST) 0730 STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.0	2.0	31.98	9.91	24.61	
4.9	5.0	32.04	9.85	24.67	
9.9	10.0	32.24	9.55	24.87	
14.9	14.9	32.28	9.42	24.93	
19.9	20.0	32.37	9.27	25.02	
25.0	25.1	32.48	9.02	25.14	3.44
29.9	30.0	32.48	8.99	25.15	
34.9	35.1	32.50	8.96	25.17	
39.9	40.1	32.49	8.95	25.17	
44.7	45.0	32.52	8.90	25.20	
49.7	50.0	32.53	8.89	25.20	3.33
59.7	60.0	32.54	8.87	25.21	
68.6	69.0	32.76	8.61	25.43	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08 CODE
LAT N 48 8.50
DATE 27/11/79
TIME (PST) 1651

TAPE: U00454 -197
LONG W 126 .00
PASS NO. 1
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
1.0	1.0	32.51	11.71	24.71	
2.1	2.1	32.50	11.70	24.70	
5.0	5.1	32.49	11.69	24.70	
9.9	10.0	32.47	11.70	24.69	
14.9	15.0	32.47	11.70	24.68	
19.9	20.0	32.47	11.70	24.68	
24.7	24.8	32.47	11.70	24.68	6.24
30.0	30.2	32.47	11.70	24.68	
34.7	34.9	32.47	11.70	24.68	
39.8	40.1	32.48	11.70	24.69	
44.9	45.1	32.48	11.65	24.70	
49.7	50.0	32.73	10.39	25.11	6.24
59.5	59.8	32.78	9.05	25.37	
69.7	70.1	32.92	8.83	25.52	
75.5	76.0	32.99	8.67	25.59	5.77
80.5	80.9	33.01	8.65	25.62	
90.5	91.0	33.12	8.52	25.72	
100.4	101.0	33.29	8.17	25.91	5.05
110.4	111.0	33.46	8.04	26.06	
120.2	120.9	33.56	8.00	26.14	
125.2	126.0	33.57	7.99	26.16	4.00
130.4	131.2	33.61	7.94	26.19	
140.1	140.9	33.68	7.87	26.26	
150.1	151.0	33.75	7.66	26.34	3.68
160.1	161.1	33.79	7.45	26.40	
170.5	171.6	33.84	7.33	26.46	
179.9	181.0	33.85	7.26	26.48	
189.8	191.1	33.87	7.14	26.51	
199.7	201.0	33.88	7.02	26.54	3.55
225.4	227.0	33.93	6.73	26.62	
250.1	251.9	33.95	6.47	26.66	3.14
275.2	277.1	33.95	6.10	26.71	
299.8	302.0	33.97	6.00	26.74	2.88
324.7	327.1	33.99	5.85	26.78	
350.4	353.0	34.00	5.63	26.81	
375.2	378.0	34.02	5.50	26.84	
400.1	403.2	34.05	5.39	26.88	
424.8	428.0	34.06	5.22	26.91	
449.4	452.9	34.09	5.19	26.94	
475.3	479.1	34.10	5.06	26.96	
500.0	504.0	34.13	4.93	26.99	.92
500.0	504.0	34.13	4.93	26.99	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08    CODE                                TAPE: U00454    -198
LAT   N 48 10.60                                     LONG W 125 56.20
DATE 27/11/79                                        PASS NO.  3
TIME (PST) 1902                                      STN: 110

  DEPTH       PRESS        SAL        TEMP     SIGMA-T
    2.1         2.1      32.55       11.54      24.77
    4.9         4.9      32.52       11.52      24.75
   10.0        10.0      32.49       11.52      24.73
   15.4        15.5      32.49       11.53      24.73
   19.7        19.8      32.49       11.53      24.73
   24.8        24.9      32.49       11.53      24.73
   29.8        29.9      32.49       11.53      24.73
   34.7        34.9      32.49       11.53      24.73
   39.8        40.1      32.50       11.53      24.74
   44.8        45.0      32.51       11.52      24.75
   49.7        50.0      32.65       10.69      25.01
   59.8        60.1      32.77        9.52      25.29
   70.2        70.6      32.87        8.57      25.52
   80.1        80.5      32.95        8.47      25.60
   90.1        90.6      33.17        8.32      25.80
  100.5       101.1      33.38        8.16      25.98
  110.3       110.9      33.50        8.14      26.08
  119.4       120.1      33.59        8.09      26.16
  130.2       131.0      33.66        8.00      26.22
  140.0       140.9      33.72        7.86      26.29
  150.1       151.0      33.76        7.77      26.33
  159.9       160.9      33.85        7.72      26.41
  170.4       171.5      33.90        7.57      26.47
  179.8       181.0      33.92        7.41      26.51
  189.6       190.8      33.92        7.19      26.54
  199.7       201.0      33.94        7.05      26.58
  224.5       226.1      33.96        6.74      26.64
  250.4       252.1      33.98        6.46      26.69
  275.1       277.1      33.98        6.23      26.72
  299.9       302.0      33.99        6.02      26.75
  324.6       327.0      34.00        5.84      26.79
  349.9       352.5      34.02        5.64      26.83
  375.4       378.2      34.05        5.45      26.87
  399.8       402.8      34.07        5.30      26.90
  424.7       428.0      34.10        5.24      26.93
  450.5       454.1      34.11        5.07      26.96
  475.1       478.9      34.13        4.94      26.99
  498.0       502.0      34.15        4.83      27.02
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08 CODE
LAT N 48 12.90
DATE 27/11/79
TIME (PST) 2014

TAPE: U00454 -199
LONG W 125 52.00
PASS NO. 5
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.4	4.4	32.43	11.56	24.67
5.0	5.0	32.45	11.56	24.69
10.0	10.1	32.47	11.56	24.71
14.9	15.0	32.47	11.56	24.71
19.8	19.9	32.47	11.56	24.71
24.9	25.0	32.47	11.56	24.70
29.8	30.0	32.47	11.57	24.70
34.9	35.1	32.46	11.57	24.70
39.7	39.9	32.47	11.57	24.70
44.8	45.0	32.56	11.42	24.80
49.8	50.1	32.74	10.55	25.10
59.6	59.9	32.99	9.41	25.48
69.6	69.9	33.01	8.59	25.63
79.5	80.0	33.06	8.51	25.68
90.3	90.9	33.16	8.56	25.75
100.0	100.5	33.32	8.52	25.88
110.2	110.9	33.39	8.47	25.94
120.2	120.9	33.62	8.18	26.16
130.1	130.9	33.68	7.81	26.27
139.4	140.2	33.69	7.79	26.28
150.0	150.9	33.76	7.68	26.35
160.0	161.1	33.79	7.60	26.39
169.7	170.8	33.83	7.53	26.42
179.8	181.0	33.87	7.54	26.46
189.9	191.2	33.88	7.50	26.47
199.8	201.1	33.90	7.37	26.50
225.4	227.0	33.92	7.12	26.55
250.2	251.9	33.96	7.06	26.59
275.2	277.1	33.99	6.68	26.67
299.6	301.8	33.96	6.25	26.70
324.9	327.3	33.97	5.96	26.74
350.5	353.1	33.98	5.85	26.77
375.2	378.1	34.00	5.75	26.80
396.8	399.8	34.02	5.60	26.83

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08   CODE                                    TAPE: U00454   -200
LAT  N 48 15.10                                         LONG W 125 47.70
DATE 27/11/79                                           PASS NO.  7
TIME (PST) 2137                                         STN: 108

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
   2.5        2.6      32.41      12.00      24.58
   4.8        4.9      32.41      12.00      24.58
   9.9        9.9      32.41      12.01      24.58
  14.9       15.0      32.41      12.00      24.58
  19.8       19.9      32.41      12.00      24.58
  24.9       25.0      32.41      12.00      24.58
  29.8       30.0      32.42      12.00      24.59
  34.9       35.1      32.43      11.94      24.61
  39.8       40.0      32.44      11.88      24.63
  44.7       44.9      32.48      11.80      24.67
  49.7       50.0      32.64      11.31      24.89
  59.6       59.9      32.95      10.43      25.28
  69.8       70.1      33.08       8.74      25.66
  80.4       80.9      33.26       8.66      25.81
  90.4       90.9      33.39       8.37      25.96
 100.5      101.1      33.40       8.37      25.97
 110.3      111.0      33.54       8.13      26.11
 120.4      121.1      33.65       7.88      26.23
 130.2      131.0      33.69       7.83      26.27
 139.9      140.7      33.71       7.76      26.30
 150.6      151.5      33.72       7.74      26.31
 160.5      161.5      33.73       7.73      26.32
 169.9      171.0      33.73       7.73      26.32
 179.9      181.0      33.73       7.73      26.32
 185.6      186.8      33.73       7.74      26.31
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08 CODE
LAT N 48 18.60
DATE 27/11/79
TIME (PST) 2323

TAPE: U00454 -201
LONG W 125 41.20
PASS NO. 9
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.5	2.6	32.43	11.92	24.61
5.0	5.1	32.41	11.92	24.60
10.0	10.0	32.41	11.93	24.60
14.9	15.0	32.41	11.92	24.60
19.9	20.0	32.41	11.92	24.60
24.8	24.9	32.41	11.92	24.60
29.9	30.1	32.41	11.92	24.59
34.8	35.0	32.41	11.93	24.60
39.7	39.9	32.42	11.94	24.60
44.8	45.0	32.42	11.94	24.60
49.8	50.0	32.48	11.88	24.66
59.5	59.8	32.90	10.66	25.20
69.7	70.1	33.18	9.54	25.61
79.6	80.1	33.28	8.99	25.77
90.5	91.0	33.36	8.60	25.90
100.5	101.0	33.44	8.03	26.05
110.0	110.7	33.49	7.97	26.09
120.3	121.0	33.51	7.96	26.11
130.3	131.1	33.52	7.95	26.12
131.3	132.1	33.53	7.95	26.13

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08   CODE                                TAPE: U00454   -202
LAT  N 48 22.00                                     LONG W 125 34.70
DATE 28/11/79                                       PASS NO. 11
TIME (PST) 0040                                     STN: 106

 DEPTH     PRESS      SAL      TEMP   SIGMA-T
   2.0       2.0    32.34     11.90    24.55
   4.9       5.0    32.34     11.91    24.54
  10.0      10.1    32.34     11.91    24.55
  15.0      15.1    32.34     11.91    24.54
  20.6      20.7    32.34     11.93    24.54
  25.5      25.6    32.34     11.93    24.54
  29.8      30.0    32.36     11.96    24.55
  34.9      35.1    32.38     11.96    24.56
  40.4      40.6    32.42     11.99    24.59
  44.6      44.9    32.58     11.92    24.73
  49.8      50.1    32.68     11.31    24.92
  59.7      60.0    32.77     10.79    25.08
  69.8      70.1    32.85     10.37    25.22
  79.7      80.1    33.11      9.42    25.58
  90.5      91.0    33.25      8.81    25.78
 100.4     101.0    33.36      8.39    25.93
 110.3     110.9    33.42      8.04    26.03
 120.3     121.0    33.45      8.00    26.06
 125.3     126.1    33.47      7.98    26.07

CRUISE NO:  08   CODE                               TAPE: U00454   -203
LAT  N 48 25.50                                     LONG W 125 28.30
DATE 28/11/79                                       PASS NO. 13
TIME (PST) 0150                                     STN: 105

 DEPTH     PRESS      SAL      TEMP   SIGMA-T
   2.0       2.0    32.20     12.10    24.40
   4.9       4.9    32.20     12.10    24.40
   9.9       9.9    32.20     12.10    24.40
  15.1      15.2    32.20     12.11    24.40
  20.0      20.1    32.20     12.12    24.40
  24.9      25.0    32.21     12.12    24.40
  29.9      30.0    32.20     12.12    24.40
  34.8      35.0    32.20     12.17    24.39
  39.9      40.1    32.33     12.16    24.49
  44.7      45.0    32.42     12.25    24.55
  49.8      50.1    32.50     12.13    24.63
  59.7      60.0    32.54     11.93    24.70
  69.6      70.0    32.62     11.52    24.83
  80.4      80.8    32.86     10.24    25.24
  89.5      90.0    32.99      9.86    25.41
 100.4     101.0    33.17      8.94    25.69
 110.4     111.0    33.24      8.68    25.79
 120.3     121.0    33.38      8.33    25.95
 130.3     131.0    33.42      8.23    26.00
 140.7     141.5    33.43      8.17    26.02
 141.1     142.0    33.43      8.16    26.02
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08 CODE
LAT N 48 28.90
DATE 28/11/79
TIME (PST) 0309

TAPE: U00454 -204
LONG W 125 21.80
PASS NO. 15
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.8	2.8	32.19	11.94	24.42
5.0	5.0	32.18	11.93	24.42
9.9	10.0	32.18	11.92	24.42
14.8	14.9	32.18	11.93	24.42
20.0	20.1	32.18	11.93	24.42
25.1	25.2	32.20	11.94	24.42
29.9	30.0	32.22	11.98	24.44
34.8	35.0	32.22	11.98	24.44
39.8	40.0	32.26	12.03	24.46
45.0	45.2	32.26	12.05	24.46
49.8	50.1	32.32	12.14	24.49
59.7	60.0	32.43	12.25	24.55
69.8	70.2	32.51	12.17	24.63
79.6	80.0	32.70	11.59	24.88
90.5	91.0	32.86	10.47	25.20
99.5	100.0	32.81	9.71	25.29
110.4	111.1	32.97	9.28	25.49
119.9	120.5	33.09	9.08	25.61
130.3	131.1	33.28	8.52	25.85
139.9	140.7	33.35	8.34	25.93

CRUISE NO: 08 CODE
LAT N 48 32.20
DATE 28/11/79
TIME (PST) 0407

TAPE: U00454 -205
LONG W 125 15.50
PASS NO. 17
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	31.58	11.61	24.01
4.9	5.0	31.59	11.62	24.02
9.9	10.0	31.58	11.60	24.01
15.0	15.0	31.65	11.66	24.05
19.9	19.9	31.62	11.66	24.03
24.9	25.1	31.62	11.66	24.03
29.9	30.0	31.70	11.76	24.07
34.9	35.0	31.75	11.79	24.10
39.6	39.8	31.84	11.89	24.16
44.8	45.0	31.96	11.99	24.23
49.8	50.1	32.15	12.17	24.35
59.5	59.8	32.37	12.48	24.46
69.8	70.1	32.40	12.31	24.51
79.5	79.9	32.49	12.22	24.60
90.3	90.7	32.55	11.60	24.76
92.3	92.7	32.55	11.40	24.80

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 08 CODE TAPE: U00454 -206
LAT N 48 35.60 LONG W 125 9.00
DATE 28/11/79 PASS NO. 19
TIME (PST) 0501 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	31.08	10.86	23.75
4.9	4.9	31.08	10.86	23.75
10.0	10.0	31.07	10.88	23.74
14.9	14.9	31.10	10.90	23.76
19.9	20.0	31.13	10.96	23.78
25.0	25.1	31.16	11.04	23.78
29.9	30.0	31.32	11.25	23.87
35.4	35.6	31.67	11.65	24.07
39.9	40.0	31.82	11.70	24.18
44.8	45.0	31.93	11.77	24.25
49.8	50.0	32.03	11.98	24.29
59.4	59.7	32.29	12.22	24.45
69.8	70.1	32.40	12.25	24.52
79.7	80.0	32.49	11.71	24.69
89.5	90.0	32.48	10.90	24.84
91.4	91.8	32.49	10.88	24.84

CRUISE NO: 08 CODE TAPE: U00454 -207
LAT N 48 39.00 LONG W 125 2.50
DATE 28/11/79 PASS NO. 21
TIME (PST) 0542 STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.3	2.3	31.51	11.14	24.04
4.9	4.9	31.51	11.13	24.04
9.9	10.0	31.52	11.18	24.04
14.9	15.0	31.63	11.27	24.11
20.1	20.2	31.72	11.47	24.14
24.8	24.9	31.88	11.71	24.22
29.9	30.0	31.96	11.82	24.27
34.8	34.9	32.07	11.83	24.34
39.9	40.1	32.16	11.74	24.43

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09   CODE                        TAPE: U00454    -224
LAT  N 48 39.00                             LONG W 125  2.50
DATE  7/ 2/80                               PASS NO.  1
TIME (PST) 1830                             STN: 101

 DEPTH     PRESS      SAL      TEMP    SIGMA-T   OXYGEN
  10.0      10.0     29.39     7.56     22.93
  14.6      14.7     30.10     8.00     23.43
  20.0      20.1     30.21     8.12     23.50
  25.2      25.3     30.24     8.11     23.52    6.74
  29.9      30.0     30.56     8.03     23.79
  34.7      34.9     30.76     8.02     23.94
  39.8      39.9     30.89     7.99     24.05
  39.8      39.9     30.89     7.99     24.05

CRUISE NO:  09   CODE                       TAPE: U00454    -225
LAT  N 48 35.60                             LONG W 125  9.00
DATE  7/ 2/80                               PASS NO.  4
TIME (PST) 1930                             STN: 102

 DEPTH     PRESS      SAL      TEMP    SIGMA-T
   2.3       2.3     27.01     7.16     21.11
   5.2       5.3     28.08     7.46     21.91
   9.9       9.9     30.31     7.94     23.60
  15.0      15.0     30.87     8.02     24.03
  19.9      20.0     30.93     8.04     24.08
  24.9      25.0     31.04     8.10     24.15
  29.9      30.0     31.30     8.25     24.33
  34.9      35.1     31.46     8.27     24.46
  39.6      39.7     31.53     8.37     24.49
  44.8      45.0     31.67     8.53     24.58
  49.8      50.0     31.73     8.57     24.63
  59.7      60.0     31.92     9.04     24.70
  69.6      70.0     32.23     9.53     24.87
  79.6      80.0     32.29     9.59     24.90
  89.6      90.1     32.39     9.59     24.98
 100.5     101.0     32.40     9.55     25.00
 103.3     103.8     32.50     9.49     25.09
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COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 09 CODE — TAPE: U00454 -226
LAT N 48 32.20 — LONG W 125 15.50
DATE 7/ 2/80 — PASS NO. 6
TIME (PST) 2028 — STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.6	2.6	31.02	9.38	23.95	
5.0	5.0	31.12	9.41	24.02	
10.0	10.0	31.25	9.38	24.13	
15.3	15.3	31.66	9.19	24.48	
20.0	20.1	31.64	8.46	24.57	
24.9	25.0	31.78	8.67	24.65	6.09
29.8	30.0	31.86	8.36	24.76	
34.8	35.0	31.88	8.28	24.79	
39.8	40.0	31.95	8.33	24.83	
44.8	45.0	32.25	9.38	24.91	
49.8	50.1	32.28	9.43	24.93	6.25
59.6	60.0	32.36	9.57	24.96	
69.7	70.1	32.46	9.62	25.04	
74.8	75.2	32.48	9.60	25.05	6.25
79.6	80.0	32.50	9.60	25.07	
89.4	89.9	32.53	9.54	25.10	
100.5	101.1	32.55	9.52	25.12	6.17
105.3	105.9	32.57	9.51	25.14	

CRUISE NO: 09 CODE — TAPE: U00454 -227
LAT N 48 28.90 — LONG W 125 21.80
DATE 7/ 2/80 — PASS NO. 8
TIME (PST) 2136 — STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.7	1.7	32.30	9.90	24.86
5.0	5.0	32.50	9.91	25.02
9.9	9.9	32.56	9.90	25.07
15.0	15.1	32.59	9.89	25.09
19.8	19.9	32.64	10.03	25.10
24.9	25.1	32.67	10.11	25.12
29.8	30.0	32.67	10.02	25.13
34.9	35.1	32.65	9.95	25.13
39.9	40.1	32.65	9.85	25.14
45.1	45.4	32.67	9.72	25.18
49.7	50.0	32.71	9.75	25.21
59.6	60.0	32.76	9.76	25.25
69.6	70.0	32.79	9.61	25.30
79.5	80.0	32.96	9.63	25.42
90.4	90.9	32.96	9.42	25.46
100.4	101.0	33.00	9.19	25.52
110.4	111.1	33.06	9.03	25.60
120.3	121.0	33.10	8.77	25.67
130.3	131.1	33.22	8.63	25.79
140.1	141.0	33.25	8.58	25.82
142.1	143.0	33.26	8.58	25.82

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE
LAT N 48 25.50
DATE 7/ 2/80
TIME (PST) 2230

TAPE: U00454 -228
LONG W 125 28.30
PASS NO. 10
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.9	.9	32.48	9.60	25.06	
2.0	2.0	32.49	9.67	25.05	
4.9	5.0	32.45	9.65	25.02	
9.9	9.9	32.37	9.70	24.95	
14.9	15.0	32.50	9.84	25.03	
19.9	20.0	32.62	9.84	25.13	
24.8	25.0	32.64	9.82	25.14	6.34
30.4	30.5	32.65	9.77	25.16	
34.7	34.9	32.66	9.77	25.16	
39.8	40.0	32.66	9.77	25.16	
44.8	45.1	32.66	9.74	25.17	
49.6	49.9	32.66	9.71	25.18	6.34
59.6	59.9	32.69	9.55	25.22	
69.7	70.1	32.73	9.53	25.26	
74.6	75.0	32.77	9.47	25.30	6.13
79.6	80.1	32.83	9.40	25.36	
89.6	90.1	32.99	9.38	25.48	
100.3	100.9	33.14	9.37	25.61	4.02
110.2	110.9	33.22	9.14	25.70	
120.4	121.1	33.35	8.94	25.83	
125.1	125.9	33.39	8.77	25.90	4.02
125.1	125.9	33.39	8.77	25.90	

CRUISE NO: 09 CODE
LAT N 48 22.00
DATE 7/ 2/80
TIME (PST) 2340

TAPE: U00454 -229
LONG W 125 34.70
PASS NO. 14
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.8	3.8	32.51	9.38	25.11
5.0	5.0	32.52	9.38	25.12
9.9	9.9	32.54	9.38	25.13
15.0	15.1	32.57	9.45	25.15
19.8	19.9	32.59	9.46	25.16
24.9	25.0	32.59	9.45	25.16
29.8	29.9	32.59	9.45	25.16
34.8	35.0	32.59	9.46	25.16
39.9	40.1	32.61	9.50	25.17
44.7	45.0	32.62	9.50	25.18
49.6	49.9	32.62	9.50	25.18
59.8	60.2	32.63	9.52	25.18
70.6	71.0	32.70	9.56	25.23
79.5	80.0	32.80	9.48	25.32
90.3	90.9	33.00	9.40	25.49
100.3	100.9	33.15	9.03	25.67
110.2	110.9	33.34	8.82	25.85
120.2	120.9	33.43	8.70	25.94
121.1	121.9	33.44	8.69	25.94

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE TAPE: U00454 -230
LAT N 48 18.60 LONG W 125 41.20
DATE 8/ 2/80 PASS NO. 16
TIME (PST) 0037 STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
5.3	5.3	32.29	9.04	24.99	
9.7	9.7	32.29	9.05	24.99	
15.0	15.0	32.31	9.09	25.00	
20.1	20.2	32.37	9.21	25.03	
24.9	25.0	32.43	9.32	25.06	6.37
29.9	30.1	32.49	9.43	25.09	
34.7	34.9	32.51	9.44	25.10	
39.8	40.0	32.51	9.45	25.10	
44.7	45.0	32.55	9.50	25.13	
49.7	50.0	32.62	9.58	25.17	6.29
59.6	59.9	32.72	9.70	25.23	
69.6	70.0	32.77	9.72	25.26	
74.6	75.0	32.87	9.69	25.35	5.58
79.7	80.2	32.98	9.63	25.44	
90.4	91.0	33.24	9.22	25.71	
100.3	100.9	33.43	8.93	25.90	4.02
110.2	110.9	33.57	8.64	26.06	
120.2	121.0	33.63	8.45	26.13	
125.2	126.0	33.65	8.42	26.15	3.34
130.2	131.0	33.67	8.30	26.18	
140.0	140.9	33.67	8.21	26.20	
142.2	143.1	33.67	8.21	26.20	

CRUISE NO: 09 CODE TAPE: U00454 -231
LAT N 48 15.10 LONG W 125 47.70
DATE 8/ 2/80 PASS NO. 18
TIME (PST) 0145 STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.6	2.6	32.50	9.33	25.11
5.0	5.0	32.50	9.32	25.11
10.0	10.1	32.49	9.32	25.10
14.8	14.9	32.49	9.33	25.10
19.9	20.1	32.49	9.33	25.11
24.8	24.9	32.50	9.34	25.11
29.9	30.1	32.51	9.35	25.11
34.8	35.0	32.53	9.38	25.12
39.7	39.9	32.57	9.46	25.15
44.7	45.0	32.62	9.53	25.17
49.7	50.0	32.76	9.73	25.25
59.6	60.0	32.86	9.84	25.31
69.5	69.9	33.00	9.60	25.46
79.5	80.0	33.26	9.21	25.72
90.5	91.0	33.43	8.90	25.90
100.4	101.0	33.55	8.65	26.04
110.1	110.8	33.59	8.55	26.09
120.2	120.9	33.63	8.45	26.13
130.2	131.1	33.67	8.31	26.19
140.1	141.0	33.70	8.23	26.22
144.1	145.1	33.71	8.19	26.24

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09   CODE
LAT N 48 12.90
DATE 8/ 2/80
TIME (PST) 0232

TAPE: U00454   -232
LONG W 125 52.00
PASS NO. 20
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
1.7	1.7	32.59	9.22	25.20	
5.0	5.0	32.58	9.22	25.19	
9.9	10.0	32.57	9.24	25.18	
15.3	15.4	32.63	9.36	25.21	
19.9	20.0	32.64	9.38	25.21	
24.9	25.0	32.64	9.39	25.21	6.43
29.9	30.1	32.65	9.42	25.22	
34.9	35.1	32.66	9.42	25.22	
39.7	39.9	32.66	9.43	25.22	
44.7	44.9	32.67	9.46	25.22	
49.6	49.9	32.69	9.49	25.24	6.42
59.7	60.1	32.77	9.34	25.32	
69.6	70.0	32.86	9.44	25.37	
74.6	75.0	32.95	9.19	25.48	3.33
79.5	80.0	33.03	9.17	25.55	
90.2	90.8	33.45	8.70	25.95	
100.3	100.9	33.60	8.18	26.15	4.13
110.3	111.0	33.71	8.03	26.25	
119.2	120.0	33.75	8.02	26.29	
125.2	126.0	33.78	7.98	26.32	6.05
130.2	131.1	33.80	7.94	26.34	
140.3	141.2	33.80	7.87	26.35	
150.1	151.0	33.83	7.79	26.39	2.96
159.9	161.0	33.84	7.80	26.39	
169.9	171.1	33.85	7.78	26.41	
179.8	181.0	33.86	7.75	26.41	
189.7	191.0	33.86	7.63	26.44	
199.7	201.1	33.87	7.61	26.44	2.82
224.5	226.1	33.92	7.36	26.52	
250.2	252.0	33.94	7.06	26.57	2.79
275.0	276.9	33.98	7.00	26.62	
299.7	301.9	33.98	6.50	26.69	2.39
324.7	327.1	33.99	6.15	26.74	
349.5	352.2	34.01	6.04	26.76	
375.3	378.2	34.02	5.89	26.79	
399.9	403.0	34.03	5.71	26.83	
424.8	428.1	34.05	5.57	26.86	
449.6	453.1	34.06	5.35	26.89	
475.4	479.2	34.08	5.12	26.94	
498.1	502.1	34.10	5.02	26.96	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE
LAT N 48 10.60
DATE 8/ 2/80
TIME (PST) 0353

TAPE: U00454 -233
LONG W 125 56.20
PASS NO. 22
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.8	2.8	32.68	9.44	25.23
5.1	5.1	32.68	9.44	25.24
10.0	10.0	32.68	9.44	25.24
14.9	15.0	32.69	9.46	25.24
19.9	20.0	32.70	9.47	25.24
24.9	25.0	32.68	9.47	25.23
29.8	30.0	32.69	9.47	25.24
34.8	35.0	32.69	9.47	25.24
39.8	40.1	32.70	9.47	25.24
44.7	44.9	32.72	9.43	25.27
49.6	49.9	32.75	9.30	25.31
59.7	60.0	32.78	9.28	25.34
69.6	70.0	32.83	9.22	25.39
79.5	80.0	33.35	8.97	25.83
90.5	91.0	33.46	8.74	25.96
100.3	100.9	33.54	8.51	26.06
110.2	110.9	33.62	8.36	26.14
120.3	121.1	33.68	8.23	26.21
130.2	131.0	33.75	8.08	26.28
140.0	140.9	33.79	7.96	26.33
150.0	151.0	33.82	7.92	26.36
159.8	160.9	33.82	7.83	26.38
169.9	171.0	33.84	7.76	26.40
179.9	181.1	33.86	7.66	26.43
189.8	191.1	33.89	7.46	26.48
199.8	201.2	33.89	7.15	26.53
225.5	227.0	33.95	7.05	26.58
250.3	252.1	33.97	6.60	26.66
274.9	276.9	33.97	6.29	26.70
299.8	302.0	33.96	6.14	26.71
324.6	327.0	33.99	6.07	26.75
350.3	353.0	33.99	5.95	26.76
375.0	377.9	34.01	5.89	26.79
400.0	403.1	33.99	5.54	26.81
424.7	428.0	33.99	5.34	26.84
450.3	453.9	34.03	5.15	26.89
475.3	479.1	34.06	5.21	26.91
499.7	503.8	34.09	5.11	26.94

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE
LAT N 48 8.50
DATE 8/ 2/80
TIME (PST) 0518

TAPE: U00454 -234
LONG W 126 .00
PASS NO. 24
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
5.0	5.0	32.67	9.46	25.22	
10.1	10.1	32.67	9.46	25.23	
14.8	14.9	32.67	9.46	25.23	
20.0	20.1	32.67	9.47	25.22	
24.9	25.0	32.67	9.47	25.22	6.48
29.8	29.9	32.67	9.47	25.23	
34.9	35.1	32.67	9.47	25.22	
39.9	40.1	32.67	9.47	25.23	
44.8	45.0	32.67	9.47	25.23	
49.8	50.1	32.68	9.48	25.23	6.45
59.9	60.2	32.76	9.26	25.32	
69.6	70.0	32.80	9.24	25.36	
74.6	75.1	32.93	9.26	25.46	5.37
80.4	80.9	33.30	8.97	25.79	
90.3	90.8	33.45	8.36	26.00	
100.4	101.0	33.63	8.48	26.13	3.99
110.3	111.0	33.64	8.16	26.18	
120.4	121.1	33.63	7.71	26.24	
125.2	126.0	33.65	7.59	26.27	4.15
130.1	130.9	33.68	7.58	26.30	
140.2	141.1	33.74	7.60	26.34	
150.0	151.0	33.80	7.39	26.42	3.69
159.9	160.9	33.85	7.31	26.47	
169.8	171.0	33.88	7.24	26.50	
179.9	181.2	33.88	7.13	26.52	
189.8	191.1	33.90	7.11	26.54	
199.7	201.1	33.92	6.96	26.58	2.97
225.4	227.0	33.94	6.71	26.62	
250.2	252.0	33.94	6.50	26.65	2.67
275.0	277.0	33.95	6.27	26.69	
299.8	302.0	33.95	6.06	26.72	2.38
325.4	327.9	33.96	5.86	26.75	
350.3	352.9	33.97	5.66	26.78	
375.2	378.0	33.98	5.44	26.82	
399.9	402.9	34.00	5.23	26.86	
424.6	427.9	34.01	5.11	26.88	
450.5	454.0	34.04	4.99	26.92	
475.2	479.0	34.07	4.98	26.94	
496.1	500.0	34.09	4.94	26.97	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE
LAT N 48 19.20
DATE 8/ 2/80
TIME (PST) 0632

TAPE: U00454 -235
LONG W 126 2.50
PASS NO. 26
STN: B.S. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
5.0	5.1	32.55	9.25	25.16	
9.9	10.0	32.57	9.28	25.17	
14.9	15.0	32.59	9.20	25.20	
19.8	20.0	32.61	9.19	25.22	
24.8	24.9	32.61	9.20	25.22	6.51
29.7	29.9	32.62	9.20	25.22	
34.8	35.0	32.62	9.20	25.22	
39.8	40.0	32.62	9.19	25.23	
44.8	45.0	32.62	9.19	25.23	
49.6	49.9	32.65	9.14	25.26	6.43
59.6	60.0	32.80	9.29	25.35	
69.7	70.1	33.13	9.20	25.63	
74.6	75.1	33.29	8.90	25.80	4.52
79.5	80.0	33.32	8.94	25.82	
89.5	90.1	33.49	8.61	26.00	
100.2	100.8	33.57	8.50	26.08	4.18
110.3	111.0	33.60	7.93	26.18	
120.3	121.1	33.71	7.78	26.30	
125.2	126.0	33.76	7.84	26.33	3.55
130.3	131.1	33.81	7.85	26.36	
139.0	139.9	33.83	7.85	26.38	
150.7	151.7	33.87	7.79	26.42	2.84
159.9	161.0	33.88	7.60	26.45	
170.0	171.1	33.90	7.48	26.49	
179.9	181.1	33.90	7.41	26.50	
189.8	191.1	33.91	7.39	26.51	
199.7	201.0	33.92	7.30	26.53	2.56
225.4	227.0	33.94	7.10	26.58	
250.1	251.9	33.95	7.08	26.58	2.48
275.0	277.0	33.97	7.04	26.60	
299.8	302.0	33.96	6.58	26.66	2.48
324.6	327.0	33.97	6.27	26.70	
349.6	352.2	33.97	5.89	26.76	
375.3	378.2	33.98	5.70	26.79	
399.9	403.0	34.00	5.44	26.83	
424.8	428.1	34.05	5.40	26.87	
450.3	453.8	34.05	5.36	26.88	
475.1	478.9	34.06	5.25	26.90	
500.1	504.1	34.09	5.14	26.94	.39
502.1	506.1	34.10	5.08	26.96	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09   CODE                               TAPE: U00454   -236
LAT  N 48 23.80                                    LONG W 125 57.40
DATE  8/ 2/80                                      PASS NO. 28
TIME (PST) 0753                                    STN: B.S. 7

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   1.8        1.8      32.42       9.29     25.05
   5.1        5.1      32.42       9.28     25.06
   9.9       10.0      32.42       9.27     25.06
  14.9       15.0      32.43       9.29     25.06
  20.1       20.2      32.43       9.29     25.07
  24.9       25.0      32.43       9.30     25.06
  29.8       30.0      32.44       9.34     25.07
  34.8       35.0      32.52       9.44     25.11
  39.8       40.0      32.54       9.45     25.13
  44.7       44.9      32.61       9.51     25.17
  50.3       50.6      32.67       9.54     25.21
  59.8       60.1      32.72       9.59     25.24
  69.5       69.9      32.82       9.60     25.32
  79.5       79.9      33.13       9.73     25.54
  89.5       90.0      33.38       9.42     25.78
 100.4      101.0      33.57       8.87     26.02
 110.5      111.1      33.63       8.74     26.09
 120.3      121.1      33.72       8.40     26.21
 130.5      131.3      33.74       8.28     26.25
 140.1      141.0      33.78       8.22     26.29
 150.0      151.0      33.83       8.08     26.34
 159.8      160.9      33.86       7.98     26.38
 170.4      171.5      33.84       7.95     26.37
 179.7      180.9      33.86       7.79     26.41
 189.8      191.1      33.86       7.65     26.43
 199.7      201.0      33.87       7.63     26.44
 224.6      226.1      33.89       7.43     26.49
 250.2      252.0      33.93       7.26     26.54
 275.0      277.0      33.95       6.93     26.60
 299.9      302.1      33.96       6.71     26.64
 324.5      326.9      33.99       6.41     26.70
 349.4      352.0      34.00       5.93     26.77
 375.1      377.9      34.02       5.63     26.83
 399.8      402.9      34.05       5.30     26.89
 408.7      411.8      34.07       5.20     26.91
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE
LAT N 48 28.00
DATE 8/ 2/80
TIME (PST) 0859

TAPE: U00454 -237
LONG W 125 51.50
PASS NO. 30
STN: B.S. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.8	2.9	32.35	9.13	25.02	
5.0	5.0	32.34	9.14	25.02	
9.9	10.0	32.34	9.14	25.02	
14.9	15.0	32.34	9.15	25.02	
20.0	20.1	32.34	9.15	25.02	
25.0	25.2	32.36	9.19	25.03	6.53
29.9	30.0	32.43	9.30	25.06	
34.8	35.0	32.44	9.31	25.07	
39.8	40.1	32.46	9.34	25.08	
44.8	45.0	32.56	9.43	25.14	
49.7	50.0	32.62	9.53	25.18	6.31
59.6	59.9	32.70	9.57	25.23	
70.4	70.8	32.83	9.64	25.32	
74.5	75.0	32.88	9.63	25.36	5.66
80.3	80.8	32.94	9.58	25.42	
90.4	91.0	33.09	9.37	25.56	
100.3	100.9	33.15	8.96	25.68	4.40
110.0	110.6	33.15	8.95	25.68	
116.3	117.0	33.17	8.92	25.70	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09   CODE                            TAPE: U00454   -238
LAT  N 48 32.20                                 LONG W 125 45.70
DATE  8/ 2/80                                   PASS NO. 32
TIME (PST) 1000                                 STN: B.S. 5

 DEPTH      PRESS      SAL       TEMP    SIGMA-T
   1.8        1.9     32.44      9.38     25.06
   5.0        5.0     32.44      9.37     25.06
  10.0       10.1     32.44      9.36     25.06
  14.9       15.0     32.44      9.36     25.06
  19.8       19.9     32.45      9.36     25.06
  24.8       25.0     32.45      9.33     25.07
  29.8       30.0     32.46      9.32     25.08
  34.8       35.0     32.47      9.29     25.10
  39.8       40.0     32.48      9.27     25.10
  44.9       45.1     32.52      9.29     25.13
  49.7       50.0     32.53      9.32     25.14
  59.6       60.0     32.59      9.41     25.17
  69.6       70.0     32.61      9.46     25.18
  79.6       80.0     32.62      9.39     25.19
  81.5       82.0     32.64      9.38     25.21

CRUISE NO:  09   CODE                           TAPE: U00454   -239
LAT  N 48 36.40                                 LONG W 125 40.10
DATE  8/ 2/80                                   PASS NO. 34
TIME (PST) 1040                                 STN: B.S. 4

 DEPTH      PRESS      SAL       TEMP    SIGMA-T   OXYGEN
   2.0        2.0     32.26      9.25     24.93
   5.0        5.0     32.25      9.25     24.93
   9.9       10.0     32.26      9.25     24.93
  15.1       15.2     32.27      9.28     24.94
  19.8       20.0     32.29      9.30     24.95
  24.6       24.7     32.35      9.36     24.99    6.34
  29.8       30.0     32.39      9.35     25.02
  35.1       35.3     32.38      9.34     25.01
  39.8       40.0     32.37      9.27     25.02
  44.7       45.0     32.37      9.27     25.02
  49.8       50.1     32.36      9.23     25.02    6.26
  59.4       59.8     32.36      9.23     25.02
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09    CODE                               TAPE: U00454   -240
LAT  N 48 40.40                                     LONG W 125 34.50
DATE  8/ 2/80                                       PASS NO. 36
TIME (PST) 1126                                     STN: B.S. 3

  DEPTH      PRESS       SAL        TEMP    SIGMA-T
    2.5        2.5      32.28       9.16     24.96
    4.9        4.9      32.26       9.16     24.95
    9.9       10.0      32.27       9.15     24.96
   14.8       14.9      32.28       9.17     24.97
   19.9       20.0      32.33       9.23     24.99
   24.8       25.0      32.40       9.27     25.04
   29.8       30.0      32.39       9.25     25.04
   34.8       35.0      32.41       9.24     25.05
   39.8       40.0      32.42       9.23     25.07
   44.7       45.0      32.43       9.22     25.07
   49.8       50.0      32.44       9.22     25.08
   59.7       60.1      32.46       9.23     25.10
   69.6       70.0      32.48       9.27     25.10
   79.3       79.8      32.49       9.26     25.11
   90.5       91.0      32.50       9.26     25.13
  100.4      101.0      32.53       9.25     25.14
  110.4      111.0      32.53       9.25     25.15
  120.4      121.1      32.54       9.23     25.16
  130.2      131.0      32.55       9.25     25.16
  140.3      141.1      32.57       9.22     25.18
  150.3      151.2      32.58       9.19     25.19
  160.1      161.0      32.59       9.19     25.20
  170.0      171.0      32.60       9.18     25.21
  178.9      180.0      32.63       9.17     25.24

CRUISE NO:  09    CODE                              TAPE: U00454   -241
LAT  N 48 44.40                                     LONG W 125 29.10
DATE  8/ 2/80                                       PASS NO. 38
TIME (PST) 1206                                     STN: B.S. 2

  DEPTH      PRESS       SAL        TEMP    SIGMA-T    OXYGEN
    2.1        2.2      32.31       9.42     24.95
    5.0        5.0      32.31       9.41     24.95
   10.0       10.0      32.31       9.41     24.95
   15.0       15.1      32.32       9.38     24.96
   19.9       20.0      32.35       9.43     24.98
   24.9       25.0      32.44       9.37     25.06     6.36
   29.9       30.1      32.47       9.37     25.08
   34.9       35.0      32.48       9.34     25.09
   39.8       40.0      32.48       9.34     25.09
   44.8       45.1      32.49       9.32     25.10
   49.8       50.1      32.51       9.32     25.12     6.18
   59.5       59.8      32.53       9.33     25.14
   69.7       70.1      32.54       9.35     25.14
   74.8       75.2      32.56       9.36     25.15     6.13
   79.5       80.0      32.56       9.37     25.15
   90.5       91.0      32.57       9.35     25.16
  100.4      101.0      32.59       9.28     25.19     6.02
  110.3      110.9      32.61       9.26     25.21     5.95
  115.3      116.0      32.61       9.25     25.21
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 09 CODE
LAT N 48 48.20
DATE 8/ 2/80
TIME (PST) 1257

TAPE: U00454 -242
LONG W 125 23.70
PASS NO. 40
STN: B.S. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.3	2.3	30.28	8.38	23.52
5.1	5.1	30.31	8.40	23.54
9.9	10.0	30.56	8.52	23.71
15.0	15.1	30.77	8.63	23.87
20.0	20.1	30.91	8.81	23.95
24.9	25.0	31.49	8.76	24.41
29.9	30.0	31.54	8.71	24.45
34.9	35.1	31.76	9.03	24.58
39.9	40.0	31.86	8.99	24.66
44.8	45.0	32.05	9.14	24.79
50.3	50.5	32.11	9.05	24.85
59.7	59.9	32.28	9.26	24.95
69.8	70.1	32.48	9.40	25.08
79.6	80.0	32.59	9.60	25.14
89.5	90.0	32.58	9.52	25.15
93.2	93.7	32.59	9.45	25.16

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                              TAPE: U00454   -269
LAT  N 48 39.00                                   LONG W 125  2.50
DATE 25/ 3/80                                     PASS NO.  1
TIME (PST) 0831                                   STN: 101

 DEPTH      PRESS       SAL        TEMP    SIGMA-T    OXYGEN
   2.0        2.0      31.03       8.73     24.05
   5.0        5.0      31.04       8.74     24.06
   9.8        9.9      31.07       8.79     24.08
  14.9       15.0      31.11       8.79     24.11
  19.9       20.0      31.12       8.76     24.12
  24.8       25.0      31.12       8.75     24.12     6.53
  29.9       30.0      31.29       8.90     24.23
  34.9       35.1      31.70       9.10     24.52     6.31
  39.8       40.0      31.94       9.21     24.70
  44.5       44.7      32.12       9.10     24.85

CRUISE NO:  10   CODE                             TAPE: U00454   -270
LAT  N 48 35.60                                   LONG W 125  9.00
DATE 25/ 3/80                                     PASS NO.  3
TIME (PST) 0918                                   STN: 102

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   2.0        2.0      31.17       8.66     24.17
   5.0        5.0      31.17       8.64     24.18
  10.0       10.0      31.18       8.64     24.18
  15.0       15.0      31.17       8.64     24.18
  19.9       20.0      31.20       8.64     24.20
  24.9       25.0      31.20       8.64     24.20
  29.8       30.0      31.94       9.44     24.65
  34.9       35.1      32.36       9.68     24.94
  39.7       39.9      32.53       9.79     25.06
  44.7       44.9      32.56       9.81     25.08
  49.7       49.9      32.63       9.83     25.13
  59.8       60.1      32.65       9.83     25.15
  69.6       70.0      32.69       9.79     25.18
  79.5       80.0      32.75       9.72     25.24
  90.1       90.6      33.03       9.31     25.53
  96.3       96.9      33.05       9.28     25.55
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10 CODE
LAT N 48 32.20
DATE 25/ 3/80
TIME (PST) 1001

TAPE: U00454 -271
LONG W 125 15.50
PASS NO. 5
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.9	.9	31.70	9.21	24.50	
1.9	1.9	31.72	9.24	24.52	
5.2	5.2	31.75	9.23	24.54	
9.9	9.9	31.87	9.29	24.63	
15.2	15.3	32.14	9.42	24.81	
20.0	20.1	32.19	9.50	24.84	
24.8	25.0	32.21	9.55	24.85	6.67
29.9	30.0	32.34	9.71	24.92	
34.9	35.1	32.47	9.73	25.02	
39.8	40.0	32.49	9.74	25.04	
44.7	45.0	32.58	9.74	25.11	
49.8	50.0	32.66	9.76	25.17	6.06
59.6	60.0	32.76	9.77	25.25	
69.6	69.9	32.85	9.75	25.32	
74.6	75.0	32.89	9.72	25.35	5.42
79.5	80.0	32.95	9.63	25.42	
90.6	91.1	33.08	9.44	25.55	
100.4	101.0	33.12	9.38	25.59	4.35
103.5	104.2	33.22	9.22	25.69	

CRUISE NO: 10 CODE
LAT N 48 28.90
DATE 25/ 3/80
TIME (PST) 1052

TAPE: U00454 -272
LONG W 125 21.80
PASS NO. 7
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.7	1.7	32.30	9.31	24.96
5.0	5.0	32.30	9.31	24.96
9.8	9.9	32.29	9.31	24.95
14.9	15.0	32.31	9.34	24.96
19.8	19.9	32.41	9.52	25.01
24.8	25.0	32.44	9.55	25.03
30.1	30.2	32.44	9.58	25.03
34.7	34.9	32.45	9.58	25.04
39.9	40.1	32.46	9.60	25.04
45.3	45.5	32.46	9.60	25.04
49.7	50.0	32.47	9.61	25.04
59.6	59.9	32.49	9.66	25.05
69.5	69.9	32.54	9.69	25.08
79.6	80.0	32.68	9.74	25.19
89.4	90.0	32.83	9.66	25.32
100.3	100.9	33.15	9.11	25.65
110.3	111.0	33.59	8.26	26.13
120.2	120.9	33.82	7.59	26.41
130.2	131.0	33.87	7.39	26.48
139.0	139.9	33.90	7.31	26.51

```
COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                                   TAPE: U00454   -273
LAT  N 48 25.50                                        LONG W 125 28.30
DATE 25/ 3/80                                          PASS NO.  9
TIME (PST) 1226                                        STN: 105

 DEPTH      PRESS       SAL        TEMP    SIGMA-T    OXYGEN
   2.0        2.0      32.46       9.57     25.04
   5.1        5.1      32.46       9.56     25.04
  10.0       10.0      32.46       9.56     25.05
  14.9       14.9      32.50       9.67     25.05
  20.1       20.2      32.55       9.68     25.09
  24.9       25.0      32.57       9.68     25.11      6.66
  29.8       30.0      32.57       9.69     25.10
  35.0       35.2      32.57       9.70     25.11
  39.9       40.1      32.58       9.70     25.11
  44.8       45.0      32.58       9.70     25.11
  49.8       50.1      32.58       9.70     25.11      6.64
  59.6       59.9      32.61       9.70     25.14
  69.6       70.0      32.69       9.67     25.21
  74.5       75.0      32.67       9.46     25.23      5.83
  79.6       80.0      32.71       9.43     25.26
  90.5       91.0      32.86       9.34     25.39
 100.5      101.1      33.13       9.07     25.64      3.77
 110.3      111.0      33.54       8.48     26.06
 114.3      114.9      33.56       8.41     26.08

CRUISE NO:  10   CODE                                  TAPE: U00454   -274
LAT  N 48 22.00                                        LONG W 125 34.70
DATE 25/ 3/80                                          PASS NO. 11
TIME (PST) 1314                                        STN: 106

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   2.8        2.8      31.45       9.21     24.31
   5.6        5.6      31.44       9.19     24.31
  10.6       10.6      31.46       9.17     24.32
  14.9       14.9      31.87       9.28     24.62
  19.8       19.9      31.96       9.28     24.70
  25.0       25.1      31.97       9.27     24.70
  30.0       30.1      32.16       9.40     24.83
  34.6       34.8      32.33       9.44     24.96
  39.8       40.0      32.35       9.44     24.98
  44.9       45.1      32.55       9.45     25.13
  49.6       49.9      32.55       9.44     25.13
  59.7       60.1      32.57       9.47     25.15
  69.6       70.0      32.61       9.44     25.18
  79.7       80.1      32.72       9.27     25.30
  89.5       90.0      32.99       9.12     25.53
 100.4      101.0      33.47       8.30     26.03
 110.4      111.1      33.89       7.10     26.53
 120.3      121.0      33.97       6.66     26.66
 130.3      131.1      33.98       6.60     26.67
 137.2      138.1      33.97       6.59     26.67
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                                   TAPE: U00454    -275
LAT  N 48 18.60                                        LONG W 125 41.20
DATE 25/ 3/80                                          PASS NO.  1
TIME (PST) 1415                                        STN: 107

 DEPTH      PRESS       SAL        TEMP     SIGMA-T    OXYGEN
   2.0        2.0      31.89       9.36      24.63
   5.0        5.0      31.92       9.33      24.66
   9.9       10.0      31.95       9.30      24.69
  15.0       15.0      32.02       9.24      24.75
  19.9       20.0      32.13       9.24      24.83
  24.9       25.0      32.21       9.26      24.90     6.90
  29.8       30.0      32.46       9.50      25.05
  34.9       35.1      32.60       9.64      25.14
  39.8       40.0      32.63       9.65      25.16
  44.6       44.8      32.66       9.68      25.18
  49.8       50.1      32.68       9.69      25.20     6.37
  59.8       60.1      32.69       9.68      25.21
  69.6       70.0      32.77       9.65      25.27
  74.5       75.0      33.05       9.42      25.52     5.30
  79.5       80.0      33.13       9.34      25.60
  89.6       90.1      33.30       9.05      25.78
 100.3      100.9      33.43       8.75      25.93     3.98
 110.3      111.0      33.55       8.54      26.05
 120.2      120.9      33.61       8.41      26.12
 125.3      126.0      33.63       8.35      26.15     3.34
 130.2      131.0      33.66       8.29      26.18
 140.1      141.0      33.75       8.07      26.28
 145.8      146.7      33.89       7.61      26.46
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10 CODE TAPE: U00454 -276
LAT N 48 15.10 LONG W 125 47.70
DATE 25/ 3/80 PASS NO. 3
TIME (PST) 1520 STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.6	.6	32.26	9.37	24.91
1.9	1.9	32.26	9.45	24.90
4.9	4.9	32.29	9.40	24.94
9.9	10.0	32.38	9.31	25.02
14.9	15.0	32.45	9.37	25.07
20.0	20.1	32.52	9.45	25.11
24.9	25.1	32.58	9.51	25.15
29.9	30.1	32.61	9.53	25.16
34.9	35.1	32.67	9.58	25.21
39.8	40.0	32.69	9.59	25.22
45.0	45.2	32.68	9.59	25.21
49.6	49.9	32.69	9.59	25.22
59.6	59.9	32.69	9.60	25.21
70.4	70.8	32.74	9.59	25.25
79.5	80.0	32.98	9.53	25.45
90.5	91.0	33.28	9.29	25.73
99.5	100.1	33.41	9.00	25.87
110.3	111.0	33.52	8.80	25.99
120.2	120.9	33.56	8.72	26.03
130.2	131.1	33.63	8.52	26.12
140.1	141.0	33.68	8.38	26.18
150.1	151.1	33.75	8.20	26.27
153.8	154.8	33.77	8.16	26.29

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                                  TAPE: U00454   -277
LAT  N 48 12.90                                       LONG W 125 52.00
DATE 25/ 3/80                                         PASS NO.  5
TIME (PST) 1553                                       STN: 109

 DEPTH     PRESS       SAL        TEMP     SIGMA-T    OXYGEN
    .8        .8      32.16       9.34      24.85
   2.0       2.0      32.16       9.35      24.84
   5.1       5.1      32.16       9.35      24.84
  10.0      10.0      32.17       9.33      24.85
  15.0      15.0      32.37       9.39      25.00
  19.9      20.0      32.51       9.49      25.10
  24.9      25.1      32.52       9.49      25.10      6.66
  29.8      30.0      32.52       9.51      25.10
  34.8      35.0      32.58       9.55      25.14
  39.9      40.1      32.61       9.57      25.16
  44.7      45.0      32.62       9.56      25.17
  49.8      50.1      32.65       9.56      25.19      6.49
  59.7      60.0      32.68       9.56      25.22
  69.5      69.9      32.74       9.57      25.26
  75.4      75.8      33.06       9.49      25.53      6.38
  79.6      80.0      33.13       9.45      25.58
  90.5      91.1      33.35       9.16      25.81
 100.3     100.9      33.46       8.98      25.92      4.40
 110.4     111.0      33.59       8.76      26.05
 120.3     121.1      33.66       8.56      26.14
 125.3     126.1      33.71       8.44      26.20      3.94
 130.3     131.1      33.73       8.38      26.22
 140.3     141.2      33.75       8.26      26.26
 149.9     150.9      33.80       8.08      26.32      3.21
 159.9     161.0      33.82       8.00      26.35
 169.9     171.0      33.84       7.92      26.38
 179.8     181.0      33.85       7.87      26.39
 189.7     190.9      33.88       7.84      26.42
 199.5     200.9      33.92       7.66      26.48      2.80
 225.4     227.0      33.92       7.10      26.55
 250.4     252.2      33.95       6.97      26.60      2.97
 275.2     277.1      33.97       6.68      26.65
 299.8     302.0      33.96       6.34      26.69      2.80
 324.6     327.0      33.99       6.21      26.73
 350.4     353.0      34.02       5.96      26.78
 375.1     377.9      34.03       5.55      26.85
 399.9     403.0      34.06       5.18      26.91
 424.7     428.0      34.08       5.08      26.94
 450.5     454.0      34.08       4.84      26.96
 475.4     479.1      34.11       4.76      27.00
 493.7     497.7      34.13       4.67      27.02
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10 CODE
LAT N 48 10.60
DATE 25/ 3/80
TIME (PST) 1748

TAPE: U00454 -278
LONG W 125 56.20
PASS NO. 8
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.0	.0	2.44	9.40	1.67
2.0	2.0	32.39	9.50	24.99
4.9	4.9	32.39	9.50	25.00
10.1	10.1	32.39	9.50	25.00
15.1	15.1	32.39	9.49	25.00
20.2	20.3	32.41	9.53	25.01
24.8	24.9	32.45	9.57	25.03
29.8	30.0	32.46	9.55	25.04
35.0	35.2	32.49	9.60	25.06
40.5	40.7	32.57	9.64	25.12
44.7	45.0	32.57	9.64	25.11
49.7	50.0	32.64	9.68	25.16
59.6	59.9	32.73	9.68	25.24
69.6	70.0	32.87	9.72	25.34
79.5	80.0	33.01	9.60	25.47
90.5	91.0	33.25	9.23	25.71
100.2	100.8	33.31	9.13	25.78
110.3	111.0	33.51	8.76	25.99
120.2	120.9	33.62	8.52	26.11
130.3	131.1	33.67	8.43	26.16
140.1	140.9	33.68	8.36	26.19
150.2	151.2	33.72	8.28	26.23
160.0	161.0	33.76	8.17	26.28
169.8	170.9	33.81	8.01	26.34
180.4	181.6	33.85	7.88	26.39
189.9	191.2	33.87	7.76	26.42
199.8	201.1	33.91	7.57	26.48
225.4	227.0	33.93	7.35	26.53
250.1	251.8	33.95	7.00	26.59
274.9	276.9	33.95	6.55	26.65
300.1	302.2	33.96	6.27	26.70
324.9	327.2	33.98	6.14	26.73
350.4	353.0	34.00	5.87	26.78
375.2	378.0	34.02	5.61	26.83
390.8	393.7	34.02	5.46	26.85

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10 CODE
LAT N 48 8.50
DATE 25/ 3/80
TIME (PST) 1842

TAPE: U00454 -279
LONG W 126 .00
PASS NO. 10
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.2	3.2	32.28	9.43	24.93
5.1	5.1	32.28	9.44	24.92
9.9	10.0	32.28	9.44	24.92
15.0	15.1	32.28	9.44	24.92
19.8	20.0	32.27	9.43	24.92
24.9	25.0	32.29	9.42	24.93
29.7	29.9	32.34	9.47	24.97
34.8	35.0	32.42	9.52	25.02
39.9	40.1	32.44	9.57	25.03
44.8	45.1	32.47	9.59	25.05
49.7	50.0	32.58	9.67	25.12
59.7	60.0	32.63	9.68	25.16
69.7	70.1	32.72	9.72	25.22
79.6	80.0	32.84	9.81	25.30
89.5	90.0	32.95	9.67	25.41
100.3	100.9	33.35	9.05	25.82
110.4	111.0	33.49	8.72	25.98
120.2	121.0	33.59	8.48	26.10
130.4	131.2	33.68	8.28	26.20
140.0	140.9	33.70	8.10	26.24
150.0	151.0	33.78	8.12	26.30
160.1	161.1	33.82	8.02	26.34
169.8	170.9	33.85	7.91	26.39
179.7	180.9	33.88	7.81	26.42
189.9	191.1	33.89	7.74	26.44
199.8	201.1	33.92	7.59	26.49
224.6	226.1	33.94	7.28	26.55
250.1	251.8	33.98	6.99	26.62
275.1	277.1	33.93	6.42	26.66
299.9	302.0	33.93	6.02	26.71
324.7	327.1	33.95	5.68	26.76
349.6	352.2	34.01	5.84	26.79
375.2	378.0	33.97	5.17	26.84
400.1	403.2	34.01	5.17	26.88
424.7	428.0	34.05	5.07	26.91
450.5	454.0	34.08	4.90	26.96
475.4	479.1	34.08	4.69	26.99
498.9	502.9	34.08	4.52	27.00

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10 CODE
LAT N 48 19.20
DATE 25/ 3/80
TIME (PST) 2040

TAPE: U00454 -280
LONG W 126 2.50
PASS NO. 12
STN: B.S. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.0	1.0	31.99	9.20	24.73
2.1	2.1	31.98	9.20	24.72
5.0	5.0	31.97	9.20	24.72
9.9	9.9	31.96	9.20	24.71
14.9	15.0	31.97	9.20	24.71
19.8	19.9	31.97	9.18	24.72
24.9	25.0	31.97	9.15	24.72
29.8	29.9	32.00	9.11	24.76
35.0	35.1	32.47	9.45	25.07
39.7	40.0	32.64	9.57	25.18
44.9	45.1	32.69	9.59	25.22
50.3	50.6	32.69	9.60	25.22
59.6	60.0	32.70	9.51	25.24
69.6	70.0	32.78	9.41	25.32
79.5	80.0	32.91	9.39	25.42
90.4	90.9	33.22	9.24	25.69
99.5	100.1	33.35	9.00	25.83
109.5	110.1	33.45	8.81	25.94
119.3	120.1	33.53	8.58	26.04
130.8	131.6	33.64	8.34	26.15
140.1	141.0	33.68	8.25	26.21
150.7	151.7	33.72	8.19	26.24
160.1	161.1	33.77	8.09	26.30
170.2	171.3	33.79	8.02	26.32
179.9	181.1	33.81	7.97	26.35
189.6	190.8	33.84	7.84	26.39
199.8	201.1	33.87	7.74	26.42
224.6	226.1	33.93	7.18	26.55
250.4	252.1	33.98	6.57	26.67
275.0	276.9	34.00	6.04	26.76
299.7	301.9	34.01	5.76	26.80
324.6	327.0	34.02	5.55	26.84
350.5	353.1	34.05	5.39	26.87
375.2	378.0	34.06	5.23	26.90
399.9	402.9	34.08	5.05	26.94
424.8	428.1	34.09	4.83	26.97
450.5	454.0	34.11	4.69	27.01
475.3	479.0	34.13	4.57	27.04
497.9	501.9	34.16	4.53	27.06

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                             TAPE: UDD454   -281
LAT  N 48 23.80                                  LONG W 125 57.40
DATE 25/ 3/80                                    PASS NO. 14
TIME (PST) 2147                                  STN: B.S. 7

 DEPTH      PRESS       SAL         TEMP     SIGMA-T
   9.9       10.0      31.39        9.14      24.27
  14.9       15.0      31.48        9.12      24.35
  20.1       20.2      31.74        9.21      24.53
  25.8       25.9      31.84        9.28      24.60
  29.9       30.0      31.93        9.30      24.67
  34.6       34.8      32.37        9.41      25.00
  40.4       40.6      32.46        9.46      25.06
  44.6       44.8      32.48        9.49      25.07
  49.8       50.1      32.50        9.51      25.08
  59.7       60.0      32.61        9.54      25.16
  70.4       70.8      32.69        9.42      25.24
  80.1       80.5      32.76        9.38      25.31
  90.4       90.9      33.02        9.42      25.50
 100.1      100.6      33.12        9.33      25.59
 110.3      111.0      33.24        9.03      25.74
 119.5      120.2      33.38        8.78      25.88
 130.4      131.2      33.55        8.46      26.07
 140.4      141.3      33.74        8.10      26.27
 150.0      150.9      33.83        7.69      26.40
 160.2      161.2      33.89        7.34      26.50
 170.0      171.1      33.95        7.10      26.58
 179.9      181.0      33.96        7.07      26.59
 190.0      191.2      33.97        6.74      26.64
 199.5      200.9      33.99        6.52      26.69
 225.5      227.1      34.00        6.18      26.74
 250.2      252.0      34.00        6.10      26.75
 271.1      273.0      34.01        5.96      26.78
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10 CODE
LAT N 48 28.00
DATE 25/ 3/80
TIME (PST) 2235

TAPE: U00454 -282
LONG W 125 51.50
PASS NO. 16
STN: B.S. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	30.92	9.06	23.92
5.0	5.0	30.94	9.06	23.94
9.8	9.8	31.32	9.19	24.21
14.9	14.9	31.50	9.27	24.34
19.8	19.9	31.64	9.27	24.45
25.4	25.5	31.73	9.26	24.52
30.0	30.2	31.81	9.22	24.59
35.9	36.1	31.85	9.20	24.62
39.7	39.9	31.90	9.23	24.66
44.7	44.9	31.99	9.27	24.72
49.7	49.9	32.35	9.42	24.98
60.3	60.6	32.49	9.32	25.11
70.4	70.8	32.63	9.32	25.22
79.8	80.2	32.87	9.26	25.41
89.5	90.0	33.13	9.05	25.65
100.3	100.9	33.63	8.25	26.16
109.4	110.0	33.74	7.95	26.29
120.5	121.2	33.93	7.13	26.56
128.1	128.9	33.97	6.79	26.64

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                                   TAPE: U00454   -283
LAT  N 48 32.20                                        LONG W 125 45.70
DATE 25/ 3/80                                          PASS NO. 17
TIME (PST) 2316                                        STN: B.S. 5

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   4.9        4.9      31.04       8.90     24.04
   9.9        9.9      31.05       8.90     24.04
  14.9       15.0      31.40       9.17     24.28
  19.9       20.0      31.69       9.27     24.49
  24.9       25.1      31.76       9.25     24.54
  29.9       30.0      32.00       9.28     24.73
  34.8       35.0      32.17       9.35     24.85
  39.8       40.0      32.30       9.45     24.94
  44.8       45.1      32.44       9.50     25.04
  49.8       50.0      32.54       9.51     25.12
  59.7       60.0      32.67       9.49     25.22
  69.6       70.0      32.79       9.45     25.32
  79.6       80.1      32.96       9.52     25.44
  83.3       83.7      32.96       9.52     25.44

CRUISE NO:  10   CODE                                  TAPE: U00454   -284
LAT  N 48 36.40                                        LONG W 125 40.10
DATE 25/ 3/80                                          PASS NO. 19
TIME (PST) 2357                                        STN: B.S. 4

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   1.9        1.9      31.23       8.96     24.18
   4.9        4.9      31.23       8.97     24.17
  10.0       10.0      31.23       8.97     24.17
  15.0       15.1      31.27       9.00     24.20
  19.8       19.9      31.36       9.06     24.26
  24.9       25.0      31.50       9.14     24.36
  29.9       30.0      31.99       9.37     24.71
  34.9       35.1      32.11       9.41     24.80
  39.8       40.0      32.21       9.35     24.89
  44.8       45.0      32.38       9.45     25.00
  49.9       50.1      32.57       9.47     25.14
  56.7       57.0      32.57       9.47     25.15
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COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 10   CODE   TAPE: U00454   -285
LAT N 48 40.40   LONG W 125 34.50
DATE 26/ 3/80   PASS NO. 21
TIME (PST) 0039   STN: B.S. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.7	2.8	30.72	8.74	23.81
5.0	5.0	30.72	8.74	23.81
10.0	10.0	30.73	8.75	23.81
15.0	15.1	31.06	8.95	24.05
19.9	20.0	31.27	8.97	24.21
24.8	24.9	31.80	9.25	24.58
29.9	30.1	32.19	9.39	24.86
35.0	35.1	32.29	9.44	24.93
39.8	40.0	32.37	9.47	24.99
44.7	44.9	32.42	9.49	25.03
49.6	49.9	32.48	9.50	25.07
59.7	60.0	32.54	9.50	25.11
69.7	70.1	32.56	9.50	25.13
80.4	80.8	32.58	9.50	25.15
89.5	90.0	32.60	9.50	25.17
100.4	101.0	32.61	9.50	25.17
108.2	108.8	32.64	9.50	25.19

CRUISE NO: 10   CODE   TAPE: U00454   -286
LAT N 48 44.40   LONG W 125 29.10
DATE 26/ 3/80   PASS NO. 23
TIME (PST) 0117   STN: B.S. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	30.44	8.66	23.60
5.0	5.0	30.45	8.67	23.61
10.1	10.1	30.44	8.66	23.61
15.0	15.1	30.51	8.69	23.66
19.9	20.0	31.01	8.98	24.00
24.9	25.0	31.12	8.79	24.12
29.9	30.1	31.89	9.30	24.64
34.8	34.9	32.17	9.43	24.84
39.9	40.0	32.25	9.47	24.89
44.8	45.1	32.48	9.51	25.06
49.7	49.9	32.50	9.54	25.08
59.6	59.9	32.55	9.59	25.11
69.6	69.9	32.61	9.58	25.15
79.6	80.0	32.70	9.59	25.22
89.5	90.0	32.76	9.56	25.28
100.4	100.9	32.81	9.54	25.32
110.4	111.0	32.85	9.53	25.35
116.4	117.0	32.86	9.54	25.36

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 10   CODE                                TAPE: U00454   -287
LAT  N 48 48.20                                     LONG W 125 23.70
DATE 26/ 3/80                                       PASS NO. 25
TIME (PST) 0158                                     STN: B.S. 1

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   1.9        1.9      29.98       8.61     23.25
   5.1        5.1      30.38       8.67     23.55
  10.1       10.1      30.76       8.73     23.84
  14.9       15.0      31.12       8.79     24.12
  19.8       19.9      31.33       8.75     24.28
  25.0       25.1      31.47       8.98     24.36
  29.9       30.1      31.52       8.79     24.43
  34.8       35.0      31.80       9.22     24.58
  39.9       40.1      31.98       9.30     24.71
  44.8       45.0      32.06       9.35     24.77
  49.8       50.0      32.16       9.38     24.84
  59.7       60.0      32.43       9.54     25.02
  69.7       70.1      32.54       9.58     25.10
  80.6       81.0      32.71       9.65     25.22
  89.3       89.7      32.78       9.59     25.29

CRUISE NO:  11   CODE                               TAPE: U00454   -288
LAT  N 48 39.00                                     LONG W 125  2.50
DATE 22/ 4/80                                       PASS NO.  1
TIME (PST) 1505                                     STN: 101

 DEPTH      PRESS       SAL        TEMP    SIGMA-T   OXYGEN
    .6         .6      29.86      10.83     22.81
   2.2        2.2      29.85      10.82     22.80
   4.9        4.9      29.86      10.69     22.83
   9.9        9.9      29.88      10.31     22.91
  15.0       15.1      29.97      10.28     22.98
  19.9       20.0      30.96       9.90     23.82
  24.9       25.0      31.65       8.88     24.52     5.24
  30.0       30.1      31.78       8.58     24.67
  34.7       34.9      31.82       8.53     24.70
  39.8       40.0      31.85       8.51     24.73
  44.8       45.0      32.04       8.37     24.90
  49.9       50.1      32.08       8.35     24.93     4.72
  54.8       55.1      32.09       8.35     24.94
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE TAPE: U00454 -289
LAT N 48 35.60 LONG W 125 9.00
DATE 22/ 4/80 PASS NO. 3
TIME (PST) 1555 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.8	.8	29.73	10.56	22.76
1.9	2.0	29.73	10.58	22.74
5.0	5.0	29.73	10.57	22.75
9.9	10.0	30.56	10.33	23.44
14.9	14.9	30.71	10.23	23.57
19.9	20.0	31.08	10.07	23.88
25.0	25.1	31.57	9.60	24.34
29.9	30.1	31.66	9.40	24.44
35.0	35.1	31.90	9.57	24.61
39.8	40.0	32.03	9.57	24.71
44.6	44.8	32.04	9.55	24.71
49.8	50.0	32.18	9.62	24.81
59.7	59.9	32.36	9.28	25.01
69.5	69.9	32.62	9.16	25.23
79.6	80.1	32.60	8.56	25.31
90.4	90.9	32.92	8.44	25.57
100.4	101.0	33.04	8.37	25.68
102.5	103.0	33.04	8.37	25.69

CRUISE NO: 11 CODE TAPE: U00454 -290
LAT N 48 32.20 LONG W 125 15.50
DATE 22/ 4/80 PASS NO. 5
TIME (PST) 1640 STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.3	2.3	30.69	10.66	23.48	
5.1	5.1	30.82	10.48	23.62	
10.0	10.0	31.08	9.95	23.90	
14.9	14.9	31.09	9.92	23.91	
19.9	20.0	31.24	9.75	24.06	
24.8	25.0	31.48	9.54	24.28	6.51
29.8	30.0	31.66	9.30	24.46	
35.0	35.2	31.84	9.35	24.59	
39.7	39.9	31.86	9.32	24.61	
44.8	45.0	31.95	9.24	24.69	
49.8	50.0	32.07	9.23	24.79	5.81
59.7	60.0	32.46	9.22	25.10	
69.6	70.0	32.71	8.81	25.35	
74.6	75.0	32.77	8.76	25.41	4.41
79.7	80.1	32.95	8.77	25.55	
89.6	90.1	33.27	8.43	25.85	
100.2	100.8	33.48	8.02	26.08	3.04
110.3	111.0	33.56	7.88	26.17	
114.3	115.0	33.57	7.87	26.17	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11   CODE                                TAPE: U00454    -291
LAT  N 48 28.90                                     LONG W 125 21.80
DATE 22/ 4/80                                       PASS NO.  7
TIME (PST) 1736                                     STN: 104

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
    .1         .1     15.67        9.87      11.92
   2.0        2.0     31.03        9.95      23.86
   5.0        5.0     30.97       10.02      23.80
  10.0       10.0     31.08        9.84      23.92
  14.8       14.9     31.37        9.42      24.21
  19.9       20.0     31.81        9.26      24.58
  24.9       25.0     32.11        9.16      24.83
  29.9       30.0     32.17        9.01      24.90
  34.8       34.9     32.32        9.27      24.98
  39.8       40.0     32.39        8.90      25.09
  44.8       45.0     32.45        8.92      25.13
  49.8       50.0     32.62        8.89      25.27
  59.6       60.0     32.87        8.76      25.49
  69.6       70.0     33.07        8.66      25.66
  79.5       80.0     33.30        8.34      25.89
  90.4       91.0     33.40        8.20      25.99
 100.4      101.0     33.56        7.95      26.16
 110.4      111.0     33.65        7.85      26.24
 120.2      121.0     33.67        7.86      26.25
 130.2      131.0     33.68        7.81      26.27
 140.2      141.1     33.72        7.73      26.31
 149.6      150.6     33.79        7.59      26.38
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE
LAT N 48 25.50
DATE 22/ 4/80
TIME (PST) 1825

TAPE: U00454 -292
LONG W 125 28.30
PASS NO. 9
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.7	.7	30.92	10.23	23.73	
1.9	1.9	31.02	10.13	23.82	
5.0	5.0	31.01	10.12	23.82	
10.0	10.0	31.09	9.75	23.94	
15.0	15.0	31.38	9.92	24.14	
20.0	20.0	31.61	9.72	24.35	
24.9	25.0	31.92	9.66	24.61	6.64
29.9	30.0	32.05	9.42	24.74	
34.8	35.0	32.17	9.15	24.88	
39.8	40.0	32.41	8.97	25.10	
44.7	44.9	32.51	8.80	25.20	
49.8	50.1	32.62	8.68	25.31	4.83
59.7	60.0	32.71	8.67	25.38	
69.6	70.0	32.90	8.57	25.54	
74.6	75.1	33.02	8.53	25.64	3.69
79.6	80.0	33.10	8.46	25.72	
90.5	91.0	33.23	8.36	25.83	
100.4	101.0	33.33	8.22	25.93	3.30
110.4	111.1	33.65	7.79	26.24	
120.3	121.1	33.79	7.54	26.39	
125.3	126.0	33.79	7.54	26.39	2.60
130.2	131.0	33.81	7.46	26.42	
136.2	137.0	33.87	7.23	26.50	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE TAPE: U00454 -293
LAT N 48 22.00 LONG W 125 34.70
DATE 22/ 4/80 PASS NO. 11
TIME (PST) 1919 STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	31.45	9.95	24.19
2.0	2.0	31.55	9.85	24.29
5.0	5.0	31.55	9.81	24.30
10.0	10.0	31.64	9.76	24.37
15.0	15.1	31.73	9.79	24.44
20.0	20.1	31.81	9.68	24.52
24.9	25.0	31.99	9.32	24.72
29.9	30.0	32.04	9.12	24.78
34.8	34.9	32.10	8.85	24.88
39.8	40.0	32.18	8.66	24.96
44.7	44.9	32.28	8.71	25.03
49.7	50.0	32.48	8.80	25.17
59.7	60.0	32.72	8.92	25.35
69.6	69.9	32.84	8.79	25.46
79.6	80.0	32.91	8.73	25.53
79.6	80.0	32.91	8.73	25.53

CRUISE NO: 11 CODE TAPE: U00454 -294
LAT N 48 18.60 LONG W 125 41.20
DATE 22/ 4/80 PASS NO. 14
TIME (PST) 2026 STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	15.59	9.85	11.87	
2.1	2.1	30.91	10.08	23.75	
5.0	5.0	30.90	9.98	23.76	
10.0	10.0	31.11	9.66	23.98	
15.0	15.0	31.23	9.64	24.07	
19.9	20.0	31.64	9.42	24.43	
24.8	25.0	31.89	9.16	24.66	6.33
29.8	30.0	32.29	8.85	25.02	
34.8	35.0	32.47	8.90	25.15	
39.8	40.0	32.55	8.89	25.22	
44.8	45.0	32.59	8.93	25.25	
49.8	50.0	32.76	8.85	25.39	4.74
59.6	59.9	32.99	8.61	25.61	
69.6	69.9	33.17	8.60	25.75	
74.7	75.1	33.34	8.60	25.88	3.99
79.5	80.0	33.43	8.51	25.97	
89.5	90.1	33.52	8.39	26.06	
100.3	100.9	33.64	8.10	26.19	3.26
110.4	111.1	33.71	7.88	26.28	
120.2	120.9	33.73	7.81	26.31	
125.2	126.0	33.77	7.72	26.35	2.65
130.1	130.9	33.82	7.55	26.41	
135.1	136.0	33.83	7.47	26.43	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11   CODE
LAT N 48 15.10
DATE 22/ 4/80
TIME (PST) 2130

TAPE: U00454   -295
LONG W 125 47.70
PASS NO. 15
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.4	.4	31.17	10.02	23.97
2.0	2.0	31.21	10.01	23.99
5.1	5.1	31.20	10.01	23.99
10.0	10.0	31.25	9.80	24.06
15.0	15.0	31.87	9.63	24.57
19.9	20.0	32.01	9.46	24.71
24.8	25.0	32.01	9.45	24.71
29.9	30.0	32.05	9.34	24.76
34.9	35.0	32.11	9.16	24.83
39.8	40.0	32.36	8.98	25.06
44.6	44.8	32.56	8.98	25.21
49.7	50.0	32.66	8.92	25.30
59.7	60.0	32.86	8.87	25.46
69.6	70.0	33.08	8.87	25.64
79.6	80.1	33.24	8.74	25.78
90.5	91.0	33.41	8.60	25.94
99.5	100.1	33.53	8.37	26.07
110.4	111.0	33.66	8.12	26.20
120.3	121.0	33.73	7.90	26.30
130.2	131.0	33.78	7.79	26.35
140.1	141.0	33.84	7.49	26.44
150.1	151.0	33.85	7.47	26.45
159.8	160.9	33.87	7.36	26.48
169.8	171.0	33.89	7.27	26.51
179.8	181.0	33.90	7.24	26.52
189.7	191.0	33.91	7.20	26.53
199.7	201.0	33.91	7.18	26.53
205.2	206.6	33.92	7.12	26.55

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE
LAT N 48 12.90
DATE 22/ 4/80
TIME (PST) 2200

TAPE: U00454 -296
LONG W 125 52.00
PASS NO. 17
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.4	.4	31.89	9.71	24.57	
2.0	2.0	31.95	9.65	24.63	
5.0	5.0	31.95	9.64	24.63	
9.9	10.0	31.96	9.64	24.64	
14.9	15.0	31.98	9.62	24.66	6.94
19.9	20.0	32.00	9.61	24.67	
24.9	25.1	32.01	9.49	24.71	
29.9	30.1	32.02	9.48	24.71	
34.8	35.0	32.02	9.41	24.73	
39.8	40.0	32.06	9.32	24.77	6.76
44.8	45.1	32.27	8.96	24.99	
49.8	50.0	32.41	8.99	25.10	
59.7	60.0	32.71	8.91	25.34	
69.6	70.0	32.95	9.00	25.52	
74.6	75.0	33.02	9.01	25.57	4.74
80.5	81.0	33.09	8.91	25.64	
90.5	91.0	33.23	8.84	25.76	
100.4	101.0	33.38	8.65	25.91	4.01
110.4	111.1	33.43	8.56	25.96	
120.3	121.0	33.54	8.34	26.08	
125.2	126.0	33.60	8.23	26.14	3.28
130.2	131.0	33.65	8.15	26.19	
140.2	141.0	33.75	7.99	26.30	
150.2	151.1	33.77	7.91	26.33	2.94
160.0	161.1	33.81	7.79	26.37	
170.0	171.1	33.84	7.67	26.41	
179.8	181.0	33.88	7.50	26.47	
189.8	191.1	33.88	7.34	26.49	
199.7	201.0	33.90	7.22	26.52	2.54
225.5	227.0	33.96	6.80	26.63	
250.4	252.1	33.97	6.59	26.66	2.40
275.1	277.0	33.97	6.20	26.72	
299.8	302.0	33.99	5.99	26.75	2.13
324.7	327.1	34.00	5.86	26.78	
350.3	352.9	34.00	5.63	26.81	
375.1	377.9	34.02	5.46	26.84	
400.0	403.1	34.03	5.21	26.88	
424.7	427.9	34.06	5.03	26.93	
450.4	453.9	34.06	4.88	26.95	
475.3	479.0	34.06	4.88	26.95	
500.0	504.0	34.10	4.79	26.98	.87
500.7	504.7	34.10	4.78	26.98	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE TAPE: UG0454 -297
LAT N 48 10.60 LONG W 125 56.20
DATE 22/ 4/80 PASS NO. 19
TIME (PST) 2325 STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.5	.5	32.00	9.46	24.70
1.9	1.9	32.02	9.45	24.72
4.9	4.9	32.02	9.45	24.72
9.9	9.9	32.02	9.45	24.72
14.9	15.0	32.02	9.45	24.72
19.9	20.0	32.02	9.43	24.72
24.8	24.9	32.02	9.35	24.73
29.8	30.0	32.03	9.37	24.74
34.8	35.0	32.05	9.35	24.75
39.8	40.0	32.05	9.32	24.76
44.7	44.9	32.07	9.30	24.78
49.6	49.9	32.12	9.22	24.83
59.7	60.0	32.41	9.00	25.10
69.6	70.0	32.68	8.86	25.32
79.6	80.1	32.89	8.97	25.47
89.6	90.1	33.15	8.83	25.70
100.5	101.1	33.34	8.71	25.86
110.4	111.0	33.50	8.47	26.03
120.3	121.0	33.62	8.24	26.16
130.1	130.9	33.72	8.01	26.27
140.1	141.0	33.76	7.83	26.33
150.0	150.9	33.81	7.64	26.40
160.0	161.0	33.84	7.54	26.43
169.9	171.0	33.87	7.39	26.48
179.9	181.0	33.89	7.32	26.50
189.8	191.0	33.89	7.29	26.51
199.7	201.0	33.91	7.21	26.53
224.5	226.0	33.93	6.91	26.59
250.3	252.0	33.96	6.69	26.64
275.0	276.9	33.97	6.52	26.67
299.7	301.9	33.97	6.25	26.71
324.7	327.0	33.98	5.97	26.75
350.4	353.0	34.00	5.62	26.81
375.3	378.1	34.02	5.44	26.85
399.9	402.9	34.04	5.24	26.89
424.7	428.0	34.04	4.91	26.93
450.5	454.0	34.07	4.77	26.97
475.2	479.0	34.09	4.73	26.98
495.8	499.7	34.10	4.67	27.00

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE TAPE: U00454 -298
LAT N 48 8.50 LONG W 126 .00
DATE 22/ 4/80 PASS NO. 21
TIME (PST) 0015 STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.0	.0	32.07	9.61	24.73	
2.6	2.6	32.08	9.66	24.73	
5.0	5.0	32.08	9.66	24.73	
9.9	9.9	32.09	9.63	24.74	
15.0	15.1	32.09	9.64	24.74	
19.9	20.0	32.12	9.58	24.78	
25.0	25.1	32.13	9.59	24.78	6.81
29.8	29.9	32.12	9.57	24.78	
34.9	35.1	32.13	9.57	24.79	
39.8	40.0	32.16	9.58	24.81	
44.8	45.1	32.20	9.45	24.86	
49.7	50.0	32.24	9.26	24.92	6.46
59.7	60.1	32.33	9.10	25.01	
69.6	70.0	32.66	9.03	25.28	
74.6	75.1	32.73	8.98	25.35	5.97
79.5	80.0	32.83	8.99	25.43	
90.5	91.0	33.04	8.97	25.59	
100.4	101.0	33.28	8.78	25.81	4.34
110.3	111.0	33.47	8.59	25.98	
120.4	121.1	33.57	8.33	26.11	
125.2	126.0	33.62	8.23	26.15	3.55
130.2	131.0	33.65	8.10	26.20	
140.2	141.0	33.72	7.89	26.29	
150.0	150.9	33.78	7.73	26.36	3.03
160.0	161.0	33.83	7.59	26.42	
170.0	171.1	33.86	7.44	26.46	
179.8	181.0	33.87	7.37	26.48	
189.7	191.0	33.88	7.34	26.49	
199.7	201.0	33.90	7.29	26.51	2.55
225.5	227.0	33.96	6.79	26.63	
250.3	252.1	33.97	6.46	26.68	2.47
275.2	277.1	33.97	6.18	26.72	
299.9	302.1	33.98	5.96	26.75	2.13
324.6	327.0	33.99	5.80	26.78	
350.4	353.0	34.00	5.51	26.83	
375.2	378.0	34.02	5.25	26.87	
399.9	403.0	34.03	5.05	26.90	
424.8	428.1	34.05	4.89	26.93	
449.5	453.0	34.07	4.82	26.96	
475.2	479.0	34.10	4.72	26.99	
495.0	498.9	34.12	4.72	27.01	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11   CODE                               TAPE: U00454   -299
LAT  N 48 19.20                                    LONG W 126  2.50
DATE 23/ 4/80                                      PASS NO. 23
TIME (PST) 0243                                    STN: B.S. 8

 DEPTH      PRESS      SAL       TEMP     SIGMA-T   OXYGEN
   1.9        1.9     31.94      9.57     24.63
   5.0        5.0     31.94      9.57     24.63
   9.9       10.0     31.95      9.54     24.65
  15.0       15.0     31.97      9.42     24.68
  19.8       19.9     32.01      9.36     24.73
  24.8       24.9     32.03      9.36     24.74     6.76
  29.9       30.1     32.03      9.36     24.74
  34.8       35.0     32.04      9.35     24.75
  39.8       40.0     32.07      9.33     24.77
  44.7       45.0     32.15      9.26     24.85
  49.7       50.0     32.32      9.18     25.00     5.95
  59.7       60.0     32.55      9.01     25.20
  69.6       70.0     32.78      8.95     25.39
  74.6       75.1     32.86      8.85     25.47     5.37
  79.5       80.0     32.94      8.85     25.53
  90.5       91.0     33.23      8.79     25.77
 100.4      101.0     33.45      8.53     25.98     3.87
 110.3      111.0     33.51      8.44     26.04
 120.2      120.9     33.65      8.15     26.19
 125.2      125.9     33.70      8.03     26.25     3.34
 130.1      130.9     33.74      7.95     26.29
 140.1      141.0     33.79      7.82     26.36
 150.0      151.0     33.84      7.69     26.41     2.95
 160.1      161.1     33.87      7.56     26.45
 169.9      171.0     33.89      7.46     26.48
 179.8      180.9     33.91      7.34     26.51
 189.7      191.0     33.92      7.23     26.54
 199.7      201.0     33.94      7.13     26.57     2.67
 224.5      226.0     33.95      6.83     26.62
 250.2      251.9     33.97      6.54     26.67     2.39
 275.1      277.1     33.98      6.31     26.71
 299.8      302.0     33.98      6.12     26.74     2.12
 324.6      327.0     34.00      5.89     26.78
 350.4      353.0     34.00      5.62     26.81
 375.2      378.1     34.01      5.44     26.84
 400.0      403.0     34.02      5.29     26.87
 424.6      427.9     34.05      5.16     26.90
 449.5      453.0     34.07      5.03     26.93
 475.1      478.9     34.08      4.77     26.98
 499.6      503.6     34.11      4.71     27.00
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE
LAT N 48 23.80
DATE 23/ 4/80
TIME (PST) 0419

TAPE: U00454 -300
LONG W 125 57.40
PASS NO. 25
STN: B.S. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.9	2.0	31.46	9.82	24.22
5.0	5.1	31.44	9.82	24.20
10.0	10.0	31.56	9.79	24.30
15.0	15.0	31.63	9.74	24.36
19.8	19.9	31.63	9.73	24.37
24.9	25.0	31.67	9.65	24.41
29.9	30.0	32.00	9.31	24.73
34.9	35.1	32.11	9.23	24.82
39.8	40.0	32.16	9.05	24.89
44.8	45.0	32.27	9.03	24.98
49.8	50.0	32.36	9.03	25.05
59.7	60.0	32.59	8.79	25.27
69.7	70.1	32.94	8.73	25.55
79.6	80.1	33.11	8.71	25.69
89.5	90.0	33.39	8.64	25.91
100.4	101.0	33.52	8.35	26.06
110.4	111.0	33.61	8.17	26.16
120.1	120.9	33.68	8.02	26.23
130.2	131.0	33.71	7.93	26.28
140.1	140.9	33.77	7.77	26.34
150.2	151.1	33.87	7.52	26.45
160.1	161.1	33.88	7.34	26.49
169.9	171.0	33.90	7.24	26.52
179.8	181.0	33.93	6.99	26.58
189.9	191.1	33.95	6.80	26.62
199.6	200.9	33.97	6.43	26.68
225.5	227.0	33.98	6.27	26.71
250.3	252.1	33.99	6.06	26.75
275.1	277.0	33.98	5.93	26.76
299.8	302.0	34.00	5.69	26.80
324.6	327.0	34.00	5.74	26.80
350.4	353.0	34.02	5.61	26.82
375.1	378.0	34.04	5.55	26.85
399.9	403.0	34.05	5.40	26.88
416.9	420.2	34.06	5.39	26.88

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE
LAT N 48 28.00
DATE 23/ 4/80
TIME (PST) 0513

TAPE: U00454 -301
LONG W 125 51.50
PASS NO. 27
STN: B.S. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.9	.9	31.06	9.99	23.88	
2.0	2.0	31.07	9.94	23.90	
5.0	5.0	31.07	9.97	23.89	
10.0	10.0	31.15	9.87	23.97	
15.0	15.1	31.57	9.77	24.32	
20.0	20.1	31.68	9.79	24.39	
24.8	24.9	31.81	9.57	24.53	7.11
29.9	30.0	31.93	9.41	24.66	
34.8	35.0	32.02	9.27	24.75	
39.8	40.0	32.12	9.16	24.84	
44.8	45.0	32.24	8.93	24.97	
49.8	50.0	32.34	9.08	25.02	5.13
59.7	60.0	32.49	9.21	25.12	
69.6	70.0	32.57	9.24	25.18	
74.6	75.0	32.61	9.23	25.21	4.90
79.5	80.0	32.77	9.10	25.36	
89.6	90.1	33.17	8.68	25.74	
100.4	101.0	33.65	7.80	26.25	2.82
110.3	110.9	33.89	7.15	26.53	
114.4	115.0	33.91	7.02	26.56	

CRUISE NO: 11 CODE
LAT N 48 32.20
DATE 23/ 4/80
TIME (PST) 0617

TAPE: U00454 -302
LONG W 125 45.70
PASS NO. 29
STN: B.S. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.9	1.9	29.95	10.22	22.98
4.9	4.9	29.95	10.22	22.98
10.0	10.0	29.95	10.22	22.98
15.0	15.1	31.23	9.82	24.04
19.9	20.0	31.57	9.51	24.36
25.0	25.1	31.96	9.58	24.65
29.9	30.0	32.02	9.63	24.69
34.9	35.0	32.15	9.61	24.80
39.9	40.1	32.20	9.56	24.84
44.7	44.9	32.25	9.28	24.92
49.7	50.0	32.30	9.04	25.00
59.7	60.0	32.42	9.18	25.07
69.6	70.0	32.61	8.91	25.26
79.6	80.0	32.84	8.66	25.48
81.3	81.8	32.87	8.63	25.51

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11   CODE                                    TAPE: U00454   -303
LAT  N 48 36.40                                         LONG W 125 40.10
DATE 23/ 4/80                                           PASS NO. 31
TIME (PST) 0659                                         STN: B.S. 4

 DEPTH      PRESS       SAL       TEMP    SIGMA-T   OXYGEN
    .8         .8     30.78      10.30     23.61
   2.0        2.0     30.79      10.29     23.62
   4.9        5.0     30.79      10.29     23.62
   9.9       10.0     30.78      10.29     23.61
  14.9       15.0     31.01      10.15     23.82
  19.9       20.0     31.62       9.63     24.37
  24.9       25.1     31.75       9.30     24.53     6.21
  29.9       30.0     31.91       9.16     24.68
  34.8       35.0     32.11       9.11     24.84
  39.8       40.0     32.16       9.10     24.88
  44.7       45.0     32.20       9.07     24.91
  49.5       49.7     32.20       9.08     24.92

CRUISE NO:  11   CODE                                   TAPE: U00454   -304
LAT  N 48 40.40                                         LONG W 125 34.50
DATE 23/ 4/80                                           PASS NO. 33
TIME (PST) 0741                                         STN: B.S. 3

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .1         .1       .58      10.22       .14
   1.9        1.9     29.36      10.77     22.43
   5.1        5.1     29.37      10.77     22.43
  10.0       10.0     29.37      10.76     22.44
  15.0       15.0     30.79      10.05     23.66
  19.9       20.0     31.81       9.47     24.55
  25.0       25.1     31.89       9.30     24.64
  30.0       30.1     31.98       9.20     24.73
  34.8       34.9     32.00       9.18     24.75
  39.8       40.0     32.02       9.16     24.77
  44.8       45.0     32.04       9.14     24.78
  49.7       50.0     32.13       9.18     24.84
  59.6       59.9     32.27       9.09     24.97
  69.5       69.9     32.32       9.11     25.01
  79.6       80.0     32.40       9.14     25.06
  89.6       90.1     32.42       9.15     25.07
 100.4      100.9     32.46       9.13     25.11
 110.4      111.0     32.51       9.08     25.16
 120.4      121.0     32.57       8.94     25.23
 130.3      131.0     32.65       8.86     25.30
 140.3      141.0     32.69       8.80     25.35
 150.2      151.0     32.72       8.79     25.37
 160.2      161.1     32.72       8.79     25.37
 170.1      171.0     32.73       8.78     25.38
 175.9      176.9     32.74       8.78     25.39
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 11 CODE
LAT N 48 44.40
DATE 23/ 4/80
TIME (PST) 0820

TAPE: U00454 -305
LONG W 125 29.10
PASS NO. 35
STN: B.S. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.1	2.1	29.56	10.32	22.66	
5.0	5.0	30.10	10.14	23.11	
9.9	9.9	31.19	9.88	24.00	
15.0	15.1	31.45	9.59	24.25	
19.6	19.9	31.48	9.52	24.29	
24.9	25.0	31.56	9.42	24.37	6.09
29.8	29.9	31.60	9.24	24.42	
34.8	35.0	31.70	8.99	24.54	
39.9	40.1	31.75	8.99	24.58	
44.7	44.9	31.91	8.98	24.70	
49.9	50.1	32.03	9.23	24.76	6.09
59.8	60.1	32.07	9.05	24.82	
69.6	70.0	32.19	8.96	24.93	
74.7	75.1	32.25	8.91	24.98	5.26
79.5	79.9	32.39	9.16	25.05	
89.6	90.0	32.48	9.08	25.13	
100.5	101.0	32.54	9.15	25.17	5.01
110.4	111.0	32.60	9.20	25.21	
112.4	113.0	32.62	9.21	25.22	

CRUISE NO: 11 CODE
LAT N 48 48.20
DATE 23/ 4/80
TIME (PST) 0911

TAPE: U00454 -306
LONG W 125 23.70
PASS NO. 37
STN: B.S. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.2	2.2	29.52	10.25	22.64
5.0	5.0	29.94	10.27	22.96
9.9	10.0	30.99	9.73	23.87
14.9	14.9	31.13	9.66	23.99
19.9	20.0	31.28	9.48	24.13
24.9	25.0	31.39	9.35	24.24
29.9	30.0	31.49	9.28	24.33
34.8	35.0	31.55	9.21	24.39
39.8	40.0	31.62	9.08	24.46
44.7	44.9	31.69	9.03	24.52
49.7	49.9	31.82	8.92	24.64
59.6	59.9	32.03	8.74	24.84
69.6	70.0	32.13	8.68	24.92
79.6	80.0	32.30	8.76	25.04
89.6	90.0	32.44	8.89	25.13
92.4	92.9	32.49	8.73	25.20

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12   CODE                              TAPE: U00454   -318
LAT  N 48  8.50                                   LONG W 126    .00
DATE 11/ 6/80                                     PASS NO.  1
TIME (PST) 1842                                   STN: 111

 DEPTH      PRESS      SAL       TEMP    SIGMA-T   OXYGEN
   4.4        4.4     32.02     12.62     24.16
   4.9        4.9     31.94     12.68     24.09
   9.9        9.9     31.99     12.57     24.14
  14.9       15.0     32.13     11.54     24.45
  19.9       20.0     32.27     10.28     24.78
  25.0       25.2     32.27     10.10     24.81     5.85
  29.9       30.0     32.30      9.82     24.88
  34.9       35.0     32.37      9.55     24.98
  39.9       40.1     32.45      9.19     25.09
  44.8       45.0     32.52      8.84     25.20
  49.8       50.0     32.63      8.53     25.33     5.07
  59.7       60.0     32.88      8.17     25.59
  69.7       70.1     33.06      8.02     25.75
  74.6       75.0     33.12      7.96     25.80     4.52
  79.6       80.1     33.16      7.90     25.85
  90.5       91.0     33.45      7.75     26.09
 100.4      101.0     33.60      7.79     26.21     3.86
 110.3      111.0     33.67      7.72     26.27
 120.3      121.0     33.74      7.60     26.34
 125.2      126.0     33.75      7.56     26.36     2.97
 130.2      131.0     33.77      7.53     26.38
 140.0      140.9     33.80      7.46     26.41
 149.9      150.9     33.83      7.39     26.44     2.93
 160.0      161.1     33.85      7.20     26.49
 169.9      171.0     33.86      7.16     26.50
 179.9      181.1     33.88      7.04     26.53
 189.8      191.1     33.90      6.97     26.56
 199.6      200.9     33.92      6.87     26.58     2.53
 225.3      226.9     33.95      6.50     26.66
 250.3      252.0     33.95      6.23     26.70     2.20
 275.0      277.0     33.96      5.87     26.75
 299.7      301.9     33.97      5.71     26.77     1.93
 324.6      327.0     33.97      5.52     26.80
 350.3      352.9     33.98      5.38     26.83
 375.2      378.0     34.00      5.31     26.85
 399.9      403.0     34.02      5.19     26.88
 424.7      428.0     34.05      5.07     26.91
 450.3      453.9     34.08      4.96     26.95
 475.2      479.0     34.10      4.81     26.98
 499.9      504.0     34.11      4.75     27.00      .93
 502.8      506.8     34.11      4.74     27.00
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 10.60
DATE 11/ 6/80
TIME (PST) 1950

TAPE: U00454 -319
LONG W 125 56.20
PASS NO. 3
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	32.03	12.95	24.11
5.1	5.1	32.02	12.83	24.12
9.9	9.9	32.06	12.31	24.25
14.8	14.9	32.17	11.42	24.50
19.9	20.0	32.25	10.53	24.72
24.9	25.0	32.30	9.90	24.86
29.8	30.0	32.32	9.62	24.93
34.7	34.9	32.42	9.25	25.06
39.8	40.0	32.49	8.97	25.16
44.8	45.0	32.64	8.42	25.36
49.8	50.1	32.72	8.23	25.45
59.6	59.9	32.86	8.06	25.59
69.6	70.0	32.99	7.94	25.71
80.4	80.9	33.23	7.75	25.92
90.4	90.9	33.50	7.86	26.12
100.4	101.0	33.65	7.77	26.25
110.5	111.1	33.68	7.71	26.28
120.3	121.1	33.75	7.61	26.35
130.1	131.0	33.82	7.48	26.42
140.0	140.9	33.85	7.32	26.47
150.0	151.0	33.88	7.19	26.51
160.0	161.1	33.90	7.11	26.54
169.8	170.9	33.92	7.06	26.56
179.8	181.0	33.94	6.97	26.59
189.7	191.0	33.95	6.91	26.60
199.6	201.0	33.94	6.71	26.62
225.4	227.0	33.96	6.26	26.70
250.2	252.0	33.97	6.05	26.73
275.0	277.0	33.98	5.83	26.77
299.8	302.0	33.99	5.65	26.80
324.7	327.1	34.00	5.53	26.83
350.3	353.0	34.02	5.39	26.86
375.2	378.0	34.03	5.29	26.87
399.8	402.9	34.04	5.22	26.89
424.7	428.1	34.05	5.05	26.92
450.4	453.9	34.07	5.02	26.94
475.0	478.9	34.08	4.96	26.96
499.9	503.9	34.10	4.85	26.98
505.7	509.8	34.11	4.80	26.99

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12   CODE   TAPE: U00454   -320
LAT N 48 12.90   LONG W 125 52.00
DATE 11/ 6/80   PASS NO. 5
TIME (PST) 2040   STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.1	2.1	32.08	13.10	24.12	
5.0	5.0	32.17	12.76	24.25	
9.9	10.0	32.06	12.47	24.22	
15.0	15.1	32.33	10.67	24.76	
19.8	19.9	32.35	10.10	24.87	
24.9	25.0	32.39	9.87	24.94	5.68
29.9	30.1	32.39	9.75	24.96	
34.8	35.0	32.47	9.08	25.13	
39.7	39.9	32.50	8.64	25.22	
44.8	45.0	32.77	8.21	25.50	
49.7	49.9	32.91	7.99	25.64	4.74
59.7	60.0	33.02	7.98	25.72	
69.5	69.9	33.28	7.93	25.93	
74.5	75.0	33.34	7.93	25.99	3.53
79.5	79.9	33.53	7.88	26.14	
89.6	90.1	33.62	7.80	26.22	
100.4	101.0	33.72	7.58	26.33	2.87
110.3	111.0	33.80	7.46	26.41	
120.3	121.0	33.86	7.31	26.48	
125.2	126.0	33.86	7.31	26.48	2.66
130.1	131.0	33.87	7.29	26.49	
140.0	140.9	33.90	7.25	26.52	
150.1	151.0	33.93	7.12	26.56	2.45
160.0	161.1	33.94	6.96	26.59	
169.9	171.0	33.94	6.94	26.59	
179.8	181.0	33.91	6.84	26.59	
189.5	190.8	33.96	6.63	26.65	
199.6	201.0	33.96	6.48	26.67	2.21
225.4	226.9	33.95	6.00	26.73	
250.3	252.1	33.99	5.79	26.78	1.59
275.0	277.0	34.00	5.64	26.81	
299.9	302.1	34.00	5.56	26.82	1.47
324.5	327.0	34.01	5.51	26.83	
350.3	353.0	34.02	5.43	26.85	
375.1	378.0	34.02	5.39	26.86	
400.0	403.1	34.04	5.35	26.87	
424.7	428.0	34.04	5.24	26.89	
450.4	454.0	34.06	5.10	26.92	
475.2	479.0	34.09	4.96	26.96	
498.7	502.8	34.10	4.87	26.98	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 15.10
DATE 11/ 6/80
TIME (PST) 2210

TAPE: U00454 -321
LONG W 125 47.70
PASS NO. 7
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	32.34	12.94	24.35
5.0	5.0	32.21	12.70	24.29
10.0	10.0	32.19	12.34	24.35
14.9	15.0	32.30	10.70	24.73
19.8	19.9	32.33	10.13	24.85
24.9	25.0	32.34	9.83	24.91
29.8	30.0	32.42	9.15	25.08
34.7	34.9	32.51	8.85	25.19
39.8	40.0	32.55	8.71	25.25
44.7	45.0	32.59	8.56	25.30
49.7	50.0	32.76	8.16	25.49
59.6	59.9	33.10	7.97	25.79
69.6	70.0	33.30	7.99	25.94
79.6	80.1	33.55	7.88	26.16
90.5	91.0	33.71	7.69	26.31
100.4	101.0	33.74	7.64	26.34
110.3	111.0	33.82	7.47	26.42
120.3	121.1	33.85	7.35	26.47
130.2	131.1	33.87	7.25	26.49
140.1	141.0	33.90	7.18	26.53
150.0	151.0	33.91	7.10	26.55
159.9	161.0	33.93	6.89	26.60
169.8	171.0	33.93	6.84	26.60
179.8	181.1	33.94	6.80	26.61
189.7	191.1	33.94	6.70	26.63
199.7	201.1	33.94	6.59	26.64
209.2	210.6	33.95	6.41	26.68

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12    CODE                                  TAPE: U00454    -322
LAT   N 48 18.60                                       LONG W 125 41.20
DATE 11/ 6/80                                          PASS NO.   9
TIME (PST) 2309                                        STN: 107

 DEPTH      PRESS        SAL        TEMP      SIGMA-T     OXYGEN
   3.8        3.8      32.11       12.59      24.24
   5.1        5.2      32.11       12.44      24.27
   9.9        9.9      32.13       12.14      24.33
  14.9       15.0      32.22       10.47      24.71
  19.8       19.9      32.26       10.01      24.81
  24.9       25.0      32.34        9.51      24.96      5.39
  29.8       29.9      32.47        8.90      25.16
  34.8       35.0      32.59        8.55      25.30
  39.8       40.0      32.73        8.14      25.47
  44.8       45.0      32.92        8.06      25.64
  49.8       50.1      33.10        8.08      25.77      3.92
  59.7       60.0      33.28        8.04      25.92
  69.6       70.0      33.51        7.95      26.11
  74.6       75.0      33.59        7.88      26.19      3.07
  80.5       81.0      33.64        7.81      26.24
  90.5       91.0      33.75        7.67      26.35
 100.4      101.0      33.81        7.53      26.41      2.60
 110.3      111.0      33.87        7.33      26.48
 120.2      121.0      33.89        7.12      26.53
 125.2      126.0      33.90        7.02      26.55      2.12
 130.1      131.0      33.90        6.98      26.56
 140.1      141.1      33.91        6.85      26.59
 145.0      145.9      33.92        6.84      26.59      2.13
 150.0      151.0      33.92        6.84      26.59
 154.0      155.0      33.92        6.83      26.59
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12   CODE                                TAPE: U00454   -323
LAT  N 48 22.00                                     LONG W 125 34.70
DATE 12/ 6/80                                       PASS NO. 11
TIME (PST) 0021                                     STN: 106

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
   4.6        4.6      32.18      12.55      24.30
   4.8        4.8      32.18      12.57      24.29
  10.0       10.1      32.15      12.59      24.27
  14.8       14.9      32.20      11.64      24.48
  20.1       20.2      32.18      11.28      24.53
  25.0       25.1      32.25      10.29      24.76
  30.0       30.1      32.29       9.23      24.96
  34.8       35.0      32.68       8.56      25.37
  39.8       40.0      32.81       8.41      25.49
  44.6       44.9      32.88       8.33      25.56
  49.7       50.0      32.97       8.22      25.65
  59.7       60.0      33.24       7.96      25.90
  69.6       70.0      33.37       7.81      26.03
  79.5       80.0      33.49       7.64      26.14
  90.5       91.1      33.67       7.23      26.35
 100.3      100.9      33.71       7.11      26.39
 110.2      110.9      33.74       7.06      26.42
 120.3      121.0      33.81       6.92      26.49
 130.1      131.0      33.86       6.83      26.55
 140.0      141.0      33.92       6.57      26.63
 145.9      146.8      33.92       6.55      26.63
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12    CODE                              TAPE: U00054    -324
LAT  N 48 25.50                                    LONG W 125 28.30
DATE 12/ 6/80                                      PASS NO. 13
TIME (PST) 0106                                    STN: 105

  DEPTH       PRESS        SAL        TEMP     SIGMA-T    OXYGEN
    4.3         4.4      31.78       12.06      24.08
    5.1         5.1      31.80       12.03      24.10
   10.0        10.1      31.86       12.08      24.14
   15.0        15.0      31.99       10.21      24.57
   19.8        19.9      32.08        9.89      24.69
   24.8        24.9      32.10        9.84      24.72      5.28
   30.0        30.1      32.30        9.24      24.97
   34.9        35.1      32.37        9.00      25.07
   39.9        40.1      32.48        8.71      25.20
   44.7        44.9      32.72        8.46      25.42
   49.7        50.0      32.89        8.44      25.56      3.12
   59.6        59.9      33.20        8.06      25.86
   69.6        70.0      33.41        7.86      26.05
   75.5        75.9      33.61        7.46      26.26      2.26
   80.5        81.0      33.67        7.29      26.34
   90.3        90.8      33.75        7.07      26.43
  100.3       100.9      33.78        6.98      26.46      1.87
  110.4       111.1      33.78        6.97      26.47
  115.4       116.1      33.78        6.96      26.47      1.86
  120.2       121.0      33.79        6.94      26.48
  130.2       131.0      33.83        6.85      26.52
  139.9       140.9      33.84        6.80      26.53
  150.0       151.0      33.84        6.78      26.54
  153.6       154.6      33.85        6.77      26.55
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
TAPE: U00454 -325
LAT N 48 28.90
LONG W 125 21.80
DATE 12/ 6/80
PASS NO. 15
TIME (PST) 0211
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
5.5	5.5	32.27	11.33	24.59
10.0	10.0	32.02	11.01	24.45
14.9	15.0	32.17	10.02	24.74
19.8	19.9	32.31	9.48	24.94
24.9	25.0	32.39	9.33	25.02
29.9	30.0	32.62	8.93	25.27
34.8	35.0	32.83	8.52	25.50
39.7	39.9	33.10	8.17	25.76
44.6	44.9	33.17	8.09	25.82
49.6	49.9	33.24	8.00	25.89
59.8	60.1	33.44	7.84	26.07
69.6	70.0	33.59	7.60	26.23
80.4	80.9	33.64	7.43	26.29
90.5	91.0	33.76	7.18	26.42
100.3	101.0	33.84	6.88	26.52
110.2	110.9	33.87	6.72	26.57
120.2	121.0	33.89	6.64	26.60
130.1	130.9	33.91	6.59	26.61
140.1	141.0	33.91	6.57	26.62
150.1	151.1	33.92	6.55	26.63
150.1	151.1	33.92	6.55	26.63

COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 12 CODE
LAT N 48 32.20
DATE 12/ 6/80
TIME (PST) 0258

TAPE: U00454 -326
LONG W 125 15.50
PASS NO. 17
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.1	4.2	32.11	12.17	24.31	
5.0	5.1	32.07	12.23	24.27	
10.0	10.0	32.05	12.24	24.26	
14.9	15.0	32.11	11.30	24.48	
20.0	20.0	32.45	9.58	25.03	
24.9	25.0	32.69	8.87	25.33	2.07
29.8	30.0	32.75	8.72	25.40	
34.9	35.1	33.03	8.27	25.69	
39.7	39.9	33.15	8.11	25.81	
44.8	45.1	33.26	7.99	25.91	
49.7	50.0	33.28	7.98	25.92	2.49
59.5	59.9	33.50	7.76	26.13	
69.7	70.1	33.65	7.49	26.29	
74.7	75.1	33.67	7.43	26.31	2.91
80.5	81.0	33.71	7.29	26.37	
90.5	91.0	33.78	7.03	26.45	
100.3	100.9	33.81	6.92	26.50	3.87
110.3	111.0	33.86	6.76	26.56	
116.2	117.0	33.87	6.74	26.57	

CRUISE NO: 12 CODE
LAT N 48 35.60
DATE 12/ 6/80
TIME (PST) 0401

TAPE: U00454 -327
LONG W 125 9.00
PASS NO. 19
STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.1	4.1	31.91	12.00	24.20
5.0	5.0	31.91	12.00	24.19
10.0	10.0	31.91	12.00	24.19
15.0	15.1	31.86	11.88	24.17
19.7	19.8	31.86	11.32	24.28
25.0	25.1	32.14	10.13	24.70
29.9	30.0	32.49	9.32	25.11
34.9	35.0	32.59	8.99	25.24
39.8	40.0	32.81	8.54	25.47
44.8	45.0	32.89	8.39	25.56
49.7	50.0	33.08	8.14	25.75
59.6	59.9	33.21	7.98	25.87
69.7	70.1	33.26	7.92	25.92
79.6	80.1	33.32	7.82	25.98
90.6	91.2	33.60	7.40	26.26
99.6	100.2	33.73	7.13	26.40
103.3	103.9	33.76	7.03	26.44

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12   CODE                          TAPE: U00454   -328
LAT  N 48 39.00                               LONG W 125  2.50
DATE 12/ 6/80                                 PASS NO. 21
TIME (PST) 0450                               STN: 101

  DEPTH     PRESS      SAL      TEMP    SIGMA-T    OXYGEN
    3.1       3.1     31.61    10.66     24.20
    4.9       4.9     31.53    10.60     24.15
   10.0      10.1     32.01    10.45     24.55
   14.9      15.0     32.17     8.90     24.92
   19.9      20.0     32.22     8.72     24.99
   24.9      25.0     32.23     8.60     25.02    3.70
   29.8      30.0     32.32     8.55     25.09
   34.7      34.9     32.39     8.53     25.15
   39.8      40.0     32.42     8.52     25.18
   44.9      45.2     32.47     8.52     25.21
   49.8      50.1     32.48     8.51     25.22    3.78
   53.6      53.9     32.54     8.48     25.28

CRUISE NO:  12   CODE                         TAPE: U00454   -329
LAT  N 48 40.50                               LONG W 125    .00
DATE 12/ 6/80                                 PASS NO. 23
TIME (PST) 0531                               STN: 100

  DEPTH     PRESS      SAL      TEMP    SIGMA-T
    3.0       3.0     31.42    10.36     24.10
    5.2       5.2     31.37    10.37     24.06
   10.0      10.1     31.38    10.43     24.06
   14.9      14.9     31.42     9.68     24.21
   19.7      19.8     31.73     8.95     24.57
   24.9      25.1     31.87     8.94     24.68
   30.0      30.1     31.90     8.91     24.71
   34.7      34.9     32.39     8.53     25.15
   36.7      36.9     32.41     8.52     25.17
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 48.20
DATE 12/ 6/80
TIME (PST) 0707

TAPE: U00454 -330
LONG W 125 23.70
PASS NO. 25
STN: B.S. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.1	3.1	31.57	10.55	24.18
5.0	5.0	31.49	10.66	24.10
10.1	10.1	31.45	10.70	24.07
14.9	15.0	31.75	10.04	24.41
19.8	19.9	31.77	9.68	24.49
24.9	25.0	31.86	9.37	24.60
29.9	30.0	31.97	9.05	24.74
34.8	34.9	32.03	8.94	24.80
39.9	40.1	32.11	8.81	24.89
44.8	45.0	32.13	8.80	24.90
49.8	50.1	32.16	8.76	24.93
59.7	60.0	32.25	8.68	25.02
69.6	70.0	32.49	8.49	25.23
80.5	81.0	32.80	8.25	25.52
83.5	84.0	32.86	8.20	25.57

CRUISE NO: 12 CODE
LAT N 48 44.40
DATE 12/ 6/80
TIME (PST) 0746

TAPE: U00454 -331
LONG W 125 29.10
PASS NO. 27
STN: B.S. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.0	2.0	31.29	11.63	23.78	
5.0	5.0	31.22	11.71	23.71	
10.0	10.0	31.47	11.32	23.97	
14.9	15.0	31.59	10.68	24.18	
19.9	20.0	31.75	9.51	24.50	
25.0	25.1	31.94	9.22	24.69	4.38
29.8	30.0	31.97	9.03	24.74	
34.8	35.0	32.04	8.92	24.82	
39.9	40.1	32.10	8.80	24.88	
44.8	45.0	32.15	8.77	24.93	
49.7	50.0	32.17	8.76	24.94	3.78
59.7	60.0	32.23	8.68	25.00	
69.7	70.0	32.30	8.59	25.07	
74.6	75.0	32.50	8.59	25.23	3.56
80.5	80.9	32.68	8.44	25.39	
90.5	91.0	32.86	8.24	25.56	
100.5	101.1	33.00	8.13	25.68	3.32
110.3	110.9	33.13	7.98	25.81	
118.1	118.8	33.22	7.88	25.89	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 40.40
DATE 12/ 6/80
TIME (PST) 0845

TAPE: U00454 -332
LONG W 125 34.50
PASS NO. 29
STN: B.S. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.1	2.1	31.67	10.83	24.22
5.0	5.0	31.67	10.83	24.21
10.0	10.1	31.54	9.71	24.30
14.9	14.9	31.89	8.99	24.68
19.8	19.9	32.02	8.98	24.79
24.9	25.0	32.24	8.76	24.99
29.9	30.0	32.27	8.73	25.02
34.7	34.9	32.35	8.67	25.10
39.9	40.1	32.43	8.63	25.17
44.8	45.0	32.55	8.50	25.28
49.7	50.0	32.64	8.46	25.36
59.6	59.9	32.72	8.40	25.42
69.6	70.0	32.82	8.29	25.52
80.5	81.0	32.86	8.22	25.57
90.3	90.8	33.02	8.09	25.70
100.4	101.0	33.16	7.95	25.84
110.3	110.9	33.19	7.91	25.86
120.3	121.0	33.21	7.89	25.88
130.1	130.9	33.23	7.86	25.91
140.2	141.0	33.25	7.83	25.93
150.0	151.0	33.26	7.81	25.94
160.0	161.0	33.30	7.76	25.98
169.9	171.0	33.32	7.74	25.99
176.9	178.1	33.35	7.70	26.02

CRUISE NO: 12 CODE
LAT N 48 36.40
DATE 12/ 6/80
TIME (PST) 0935

TAPE: U00454 -333
LONG W 125 40.10
PASS NO. 31
STN: B.S. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
86.0	86.3	30.23	9.66	23.28	
5.1	5.1	31.87	11.73	24.21	
10.0	10.0	31.90	11.54	24.27	
15.0	15.0	31.93	11.16	24.36	
20.0	20.1	32.10	9.90	24.70	
24.8	24.9	32.50	8.85	25.19	3.52
30.0	30.1	32.81	8.37	25.50	
34.9	35.1	32.87	8.23	25.57	
39.8	40.0	32.89	8.18	25.59	
44.8	45.0	32.95	8.13	25.65	
49.7	49.9	33.06	8.05	25.74	2.83
53.4	53.7	33.10	8.00	25.78	

COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 12   CODE   TAPE: U00454   -334
LAT N 48 32.20   LONG W 125 43.70
DATE 12/ 6/80   PASS NO. 33
TIME (PST) 1025   STN: B.S. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.2	2.2	32.06	10.93	24.50
5.4	5.4	32.06	10.93	24.50
10.0	10.1	32.05	10.91	24.50
14.9	15.0	32.33	9.16	25.00
20.1	20.2	32.37	8.99	25.07
24.8	24.9	32.57	8.52	25.29
29.9	30.0	32.67	8.32	25.40
34.8	35.0	32.72	8.30	25.44
39.7	39.9	32.91	8.21	25.61
44.8	45.1	32.91	8.21	25.61
49.7	50.0	32.92	8.21	25.61
59.6	59.9	33.01	8.16	25.69
69.5	70.0	33.10	8.11	25.77
80.5	81.0	33.34	7.78	26.01
84.1	84.7	33.34	7.78	26.01

CRUISE NO: 12   CODE   TAPE: U00454   -335
LAT N 48 28.00   LONG W 125 51.50
DATE 12/ 6/80   PASS NO. 35
TIME (PST) 1113   STN: B.S. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.1	4.1	31.99	11.41	24.36	
4.6	4.7	31.99	11.40	24.36	
10.0	10.1	31.99	11.38	24.37	
15.0	15.1	32.16	10.23	24.70	
20.1	20.2	32.38	9.50	24.99	
24.9	25.0	32.60	8.91	25.26	4.26
29.7	29.9	32.79	8.52	25.46	
34.8	35.0	32.91	8.34	25.58	
39.8	40.0	32.95	8.29	25.63	
44.8	45.1	33.06	8.19	25.72	
49.8	50.0	33.13	8.08	25.79	2.79
59.7	60.0	33.25	7.94	25.91	
69.4	69.8	33.31	7.88	25.96	
74.6	75.1	33.34	7.83	26.00	2.79
80.4	80.9	33.40	7.74	26.06	
90.6	91.1	33.55	7.43	26.22	
100.3	100.9	33.64	7.24	26.32	1.87
110.3	111.0	33.70	7.15	26.38	
114.0	114.7	33.71	7.14	26.38	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE TAPE: U00454 -336
LAT N 48 23.80 LONG W 125 57.40
DATE 12/ 6/80 PASS NO. 38
TIME (PST) 1214 STN: D.S. 7

DEPTH	PRESS	SAL.	TEMP	SIGMA-T
5.8	5.9	31.85	12.00	24.14
10.1	10.2	31.86	12.01	24.15
15.6	15.7	31.88	11.79	24.21
19.6	19.7	32.01	11.18	24.42
25.0	25.1	32.10	11.02	24.52
28.8	28.9	32.07	10.69	24.55
35.4	35.6	32.20	9.89	24.79
39.9	40.1	32.40	9.24	25.05
44.8	45.0	32.65	8.58	25.34
50.2	50.5	32.97	8.10	25.67
59.6	59.9	33.30	8.05	25.93
70.0	70.4	33.53	7.88	26.14
79.6	80.1	33.61	7.81	26.21
89.4	90.0	33.70	7.67	26.31
101.0	101.6	33.66	7.53	26.29
110.1	110.8	33.84	7.32	26.47
120.4	121.1	33.86	7.19	26.50
129.8	130.7	33.87	7.10	26.52
140.3	141.2	33.94	6.98	26.59
149.9	150.9	33.96	6.88	26.62
160.0	161.1	33.92	6.87	26.59
170.6	171.7	33.91	6.72	26.60
178.8	180.0	33.93	6.67	26.62
188.6	189.9	34.03	6.43	26.74
199.9	201.3	33.93	6.49	26.65
224.1	225.7	33.97	6.33	26.70
249.8	251.6	33.94	6.29	26.68
275.4	277.4	33.96	6.06	26.72
299.8	302.1	33.97	5.85	26.76
324.7	327.1	33.97	5.80	26.77
350.3	352.9	34.00	5.45	26.83
375.1	378.0	34.01	5.39	26.84
399.9	403.0	34.03	5.17	26.89
424.8	428.1	34.04	5.12	26.90
440.2	443.7	34.04	5.08	26.91

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 19.20
DATE 12/ 6/80
TIME (PST) 1326

TAPE: U00454 -337
LONG W 126 2.50
PASS NO. 39
STN: B.S. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.8	3.8	32.08	12.38	24.25	
5.0	5.0	32.07	12.39	24.24	
10.0	10.1	32.07	12.36	24.25	
14.8	14.9	32.08	12.13	24.30	
19.8	19.9	32.01	11.08	24.44	
24.8	24.9	32.00	10.08	24.60	5.22
29.8	30.0	32.11	9.40	24.80	
34.8	35.0	32.35	9.22	25.01	
39.8	40.0	32.45	9.09	25.11	
44.7	45.0	32.60	8.78	25.28	
49.7	50.0	32.77	8.45	25.46	4.77
59.5	59.9	33.06	8.14	25.73	
70.1	70.5	33.27	7.92	25.93	
74.5	74.9	33.37	7.90	26.01	3.82
80.5	81.0	33.50	7.86	26.12	
89.5	90.0	33.58	7.78	26.19	
100.2	100.8	33.69	7.67	26.29	3.03
109.9	110.6	33.75	7.62	26.35	
120.1	120.8	33.79	7.49	26.40	
124.8	125.6	33.79	7.48	26.40	2.68
130.1	131.0	33.79	7.46	26.40	
140.1	141.0	33.78	7.41	26.40	
150.0	151.0	33.87	7.25	26.49	2.58
160.0	161.1	33.89	6.92	26.56	
169.9	171.1	33.90	6.88	26.57	
179.8	181.0	33.91	6.84	26.58	
189.7	190.9	33.94	6.75	26.62	
199.8	201.1	33.94	6.74	26.62	2.34
224.6	226.1	33.94	6.58	26.64	
250.2	252.0	33.96	6.34	26.69	2.07
275.0	277.0	33.96	6.19	26.71	
299.8	302.0	33.97	5.79	26.77	1.82
324.5	326.9	33.99	5.57	26.81	
350.4	353.1	34.01	5.40	26.84	
375.1	378.0	34.02	5.30	26.86	
399.9	403.0	34.03	5.20	26.89	
424.7	428.0	34.05	5.11	26.91	
450.4	454.0	34.05	5.03	26.92	
475.3	479.1	34.07	4.95	26.94	
479.3	483.1	34.07	4.94	26.95	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
TAPE: U00454 -338
LAT N 48 24.40
LONG W 126 15.42
DATE 12/ 6/80
PASS NO. 41
TIME (PST) 1532
STN: A.P. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.8	2.8	32.15	12.27	24.33	
5.0	5.0	32.14	12.28	24.32	
10.2	10.3	32.13	12.28	24.31	
15.0	15.1	32.13	10.85	24.57	
20.1	20.2	32.16	10.41	24.67	
24.9	25.0	32.27	9.99	24.83	5.70
29.8	29.9	32.33	9.75	24.91	
34.9	35.1	32.56	9.64	25.11	
39.7	39.9	32.60	9.51	25.16	
44.9	45.1	32.62	9.38	25.19	
49.7	50.0	32.60	9.31	25.20	5.44
59.6	59.9	32.64	9.03	25.27	
69.5	69.9	32.61	8.19	25.38	
74.6	75.0	32.69	8.23	25.43	5.60
80.4	80.8	32.80	8.04	25.54	
89.4	89.9	33.15	7.88	25.84	
100.4	101.0	33.40	7.87	26.04	3.58
110.3	110.9	33.50	7.87	26.11	
120.3	121.1	33.51	7.88	26.12	
125.2	125.9	33.54	7.88	26.15	3.01
130.2	131.1	33.58	7.85	26.18	
140.1	141.0	33.66	7.75	26.26	
150.0	150.9	33.72	7.58	26.33	2.66
159.9	160.9	33.80	7.39	26.42	
169.9	171.0	33.85	7.17	26.49	
179.7	180.9	33.88	7.00	26.54	
189.6	190.9	33.91	6.83	26.59	
199.6	200.9	33.92	6.64	26.62	1.95
224.5	226.1	33.95	6.21	26.70	
250.1	251.9	33.97	5.95	26.75	1.87
275.2	277.2	33.98	5.65	26.79	
299.7	301.9	33.99	5.53	26.81	1.40
324.8	327.2	34.00	5.38	26.84	
350.3	353.0	34.02	5.22	26.87	
375.2	378.1	34.02	5.12	26.89	
399.8	402.8	34.03	4.91	26.92	
424.7	428.0	34.06	4.90	26.94	
450.4	453.9	34.08	4.80	26.97	
475.3	479.1	34.10	4.77	26.99	
499.9	503.9	34.11	4.75	27.00	.59
503.0	507.1	34.10	4.74	27.00	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 29.06
DATE 12/ 6/80
TIME (PST) 1648

TAPE: U00454 -339
LONG W 126 9.48
PASS NO. 43
STN: A.P. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.1	4.2	32.17	11.99	24.40
4.9	4.9	32.16	11.98	24.39
10.0	10.0	32.17	11.98	24.40
14.7	14.8	32.17	11.96	24.40
19.9	20.0	32.19	11.58	24.48
24.9	25.1	32.23	10.63	24.69
30.0	30.2	32.32	10.02	24.86
34.9	35.0	32.40	9.48	25.01
39.8	40.0	32.46	9.10	25.12
44.9	45.1	32.54	8.79	25.23
49.8	50.0	32.64	8.44	25.36
59.9	60.2	33.03	8.11	25.71
69.8	70.2	33.32	7.99	25.96
80.4	80.8	33.43	7.90	26.06
90.4	91.0	33.57	7.87	26.18
100.4	101.0	33.69	7.66	26.30
110.2	110.9	33.80	7.45	26.41
120.4	121.1	33.83	7.37	26.45
130.2	131.0	33.88	7.15	26.52
140.0	140.9	33.91	7.00	26.56
150.1	151.1	33.93	6.86	26.60
160.0	161.1	33.95	6.69	26.63
169.9	171.0	33.95	6.49	26.67
179.8	181.0	33.96	6.35	26.69
189.8	191.1	33.96	6.27	26.70
199.7	201.1	33.96	6.23	26.70
225.4	227.0	33.97	5.97	26.74
246.3	248.1	33.98	5.89	26.76

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE TAPE: U00454 -340
LAT N 48 33.24 LONG W 126 4.00
DATE 12/ 6/80 PASS NO. 45
TIME (PST) 1741 STN: A.P. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.1	3.1	32.13	11.51	24.45	
5.0	5.0	32.11	11.53	24.43	
9.7	9.8	32.11	10.76	24.57	
14.9	14.9	32.19	9.91	24.78	
19.9	20.0	32.33	9.45	24.96	
24.8	25.0	32.42	9.07	25.09	4.46
29.8	30.0	32.48	8.91	25.16	
34.7	34.9	32.53	8.71	25.23	
39.8	40.0	32.78	8.37	25.48	
44.8	45.1	32.96	8.20	25.65	
49.7	50.0	33.10	8.04	25.78	2.70
59.7	60.0	33.37	7.87	26.02	
69.7	70.1	33.60	7.64	26.23	
75.5	76.0	33.75	7.52	26.36	2.70
80.5	81.0	33.80	7.48	26.41	
90.4	91.0	33.85	7.28	26.47	
100.5	101.2	33.89	7.18	26.52	2.54
110.1	110.8	33.89	7.12	26.53	
120.3	121.1	33.91	7.03	26.56	
125.1	125.9	33.91	6.98	26.56	2.25
130.1	131.0	33.91	6.82	26.59	
133.0	133.9	33.93	6.72	26.61	

CRUISE NO: 12 CODE TAPE: U00454 -341
LAT N 48 37.36 LONG W 125 58.16
DATE 12/ 6/80 PASS NO. 47
TIME (PST) 1846 STN: A.P. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.9	2.9	31.91	11.22	24.33
4.9	4.9	31.90	11.23	24.33
10.0	10.0	31.94	10.97	24.40
15.1	15.1	32.26	9.33	24.92
19.8	19.9	32.34	9.13	25.02
24.8	25.0	32.51	8.79	25.21
29.8	30.0	32.74	8.49	25.43
35.0	35.2	32.92	8.33	25.59
39.7	40.0	32.95	8.22	25.64
44.7	44.9	32.96	8.20	25.64
49.5	49.8	32.96	8.20	25.65
59.7	60.0	33.02	8.13	25.70
69.5	69.9	33.09	8.06	25.77
80.5	80.9	33.19	7.96	25.86
90.1	90.7	33.29	7.85	25.95
96.5	97.1	33.45	7.60	26.12

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE TAPE: U00454 -342
LAT N 48 41.41 LONG W 125 52.38
DATE 12/ 6/80 PASS NO. 49
TIME (PST) 1937 STN: A.P. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.7	2.7	31.81	10.90	24.31	
5.0	5.0	31.78	10.93	24.29	
10.0	10.0	31.85	10.84	24.35	
14.8	14.9	32.05	9.05	24.80	
19.9	20.0	32.21	8.83	24.96	
24.7	24.9	32.28	8.70	25.04	3.74
30.0	30.2	32.52	8.54	25.25	
34.6	34.8	32.66	8.46	25.37	
39.8	40.1	32.81	8.33	25.51	
44.8	45.0	32.90	8.26	25.59	
49.7	50.0	32.91	8.25	25.59	3.00
59.7	60.0	32.93	8.21	25.62	
63.6	64.0	32.94	8.20	25.63	

CRUISE NO: 12 CODE TAPE: U00454 -343
LAT N 48 45.39 LONG W 125 47.05
DATE 12/ 6/80 PASS NO. 51
TIME (PST) 2022 STN: A.P. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	31.57	11.57	24.01
4.9	5.0	31.56	11.59	24.00
9.9	10.0	31.56	11.58	24.00
14.9	15.0	31.81	10.84	24.32
19.9	20.0	32.04	9.96	24.65
24.9	25.0	32.13	9.48	24.80
29.9	30.1	32.24	9.11	24.94
34.7	34.9	32.27	8.68	25.03
39.9	40.1	32.27	8.69	25.03
44.9	45.1	32.27	8.69	25.03
49.9	50.1	32.29	8.62	25.06
59.7	60.1	32.41	8.48	25.17
69.8	70.2	32.70	8.36	25.41
76.7	77.1	32.78	8.30	25.49

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
TAPE: U00454 -344
LAT N 48 49.32
LONG W 125 41.36
DATE 12/ 6/80
PASS NO. 53
TIME (PST) 2108
STN: A.P. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.1	2.1	31.70	11.61	24.10	
5.1	5.1	31.69	11.63	24.09	
9.9	9.9	31.69	11.63	24.09	
15.0	15.1	31.69	11.63	24.09	
19.9	20.0	31.71	11.24	24.18	
24.8	24.9	31.94	9.15	24.70	4.40
29.9	30.0	31.99	9.12	24.75	
34.8	35.0	32.02	9.12	24.77	
39.9	40.1	32.13	9.00	24.88	
44.9	45.1	32.29	8.75	25.04	
49.6	49.8	32.35	8.67	25.10	3.46
52.8	53.1	32.37	8.66	25.11	

CRUISE NO: 12 CODE
TAPE: U00454 -345
LAT N 48 53.19
LONG W 125 36.12
DATE 12/ 6/80
PASS NO. 55
TIME (PST) 2155
STN: A.P. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.9	2.9	31.76	11.91	24.09
4.9	4.9	31.75	11.91	24.09
10.1	10.1	31.76	11.91	24.09
14.9	15.0	31.81	9.92	24.48
19.8	19.9	31.81	9.43	24.56
24.9	25.0	32.02	9.19	24.76
29.9	30.0	32.18	8.99	24.91
34.8	34.9	32.24	8.96	24.97
39.9	40.1	32.25	8.95	24.98
41.3	41.6	32.25	8.94	24.98

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12   CODE                          TAPE: U00454   -346
LAT  N 49  1.12                               LONG W 125 50.08
DATE 12/ 6/80                                 PASS NO. 58
TIME (PST) 2320                               STN: W.B. 1

 DEPTH     PRESS      SAL       TEMP   SIGMA-T   OXYGEN
   4.7       4.7     31.54     11.70    23.96
   5.1       5.1     31.54     11.70    23.96
   9.9      10.0     31.53     11.63    23.97
  14.8      14.9     31.74     10.70    24.29
  19.9      20.0     31.83     10.07    24.47    4.19
  24.9      25.0     31.91      9.71    24.59
  30.0      30.2     32.28      8.99    24.99
  34.6      34.8     32.35      8.89    25.06    3.40
  39.9      40.1     32.36      8.88    25.07
  39.9      40.1     32.36      8.88    25.07

CRUISE NO:  12   CODE                         TAPE: U00454   -347
LAT  N 48 57.31                               LONG W 125 55.32
DATE 12/ 6/80                                 PASS NO. 60
TIME (PST) 0005                               STN: W.B. 2

 DEPTH     PRESS      SAL       TEMP   SIGMA-T
   2.7       2.7     31.79     11.74    24.15
   5.0       5.1     31.70     11.72    24.08
   9.9      10.0     31.80      9.90    24.48
  15.0      15.0     31.88      9.17    24.65
  19.9      20.0     31.97      9.03    24.74
  25.0      25.1     32.01      8.97    24.78
  29.9      30.0     32.03      8.94    24.80
  34.8      35.0     32.41      8.76    25.13
  39.9      40.1     32.48      8.67    25.20
  44.9      45.2     32.49      8.65    25.21
  49.6      49.9     32.52      8.60    25.24
  58.7      59.0     32.53      8.58    25.25
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12   CODE   TAPE: U00454   -348
LAT N 48 53.43   LONG W 126 1.01
DATE 12/ 6/80   PASS NO. 62
TIME (PST) 0050   STN: W.B. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.4	3.4	31.54	11.35	24.02	
5.0	5.0	31.54	11.36	24.02	
10.1	10.1	31.57	11.37	24.04	
15.0	15.1	31.89	10.02	24.52	
20.0	20.1	31.98	9.14	24.73	
25.0	25.1	32.09	9.02	24.84	3.82
30.0	30.1	32.22	8.85	24.97	
34.7	34.9	32.28	8.70	25.04	
39.7	39.9	32.43	8.59	25.17	
44.9	45.1	32.59	8.55	25.30	
49.6	49.8	32.76	8.37	25.47	2.97
59.6	60.0	32.97	8.17	25.66	
64.7	65.1	33.07	8.07	25.75	2.74
69.6	70.0	33.09	8.06	25.77	
73.5	73.9	33.10	8.05	25.77	

CRUISE NO: 12   CODE   TAPE: U00454   -349
LAT N 48 49.50   LONG W 126 6.35
DATE 12/ 6/80   PASS NO. 64
TIME (PST) 0141   STN: W.B. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.7	2.7	31.64	11.46	24.08
5.1	5.1	31.62	11.48	24.06
10.0	10.0	31.62	11.48	24.07
14.9	15.0	31.64	11.45	24.09
20.0	20.1	32.11	10.95	24.53
24.9	25.0	32.34	9.59	24.95
29.9	30.1	32.33	9.34	24.98
34.9	35.1	32.42	8.98	25.10
39.7	40.0	32.59	8.71	25.27
44.8	45.0	32.68	8.58	25.37
49.8	50.0	32.79	8.46	25.47
59.7	60.0	32.95	8.30	25.62
69.5	69.9	33.15	8.19	25.79
80.5	81.0	33.38	7.80	26.03
90.4	90.9	33.66	7.52	26.29
100.2	100.8	33.69	7.30	26.34
100.2	100.8	33.69	7.30	26.34

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE TAPE: UD0454 -350
LAT N 48 45.51 LONG W 126 12.14
DATE 12/ 6/80 PASS NO. 67
TIME (PST) 0232 STN: W.B. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.4	3.4	32.13	11.96	24.37	
5.0	5.0	32.11	11.99	24.35	
10.0	10.1	32.17	11.86	24.42	
14.9	15.0	32.14	11.92	24.39	
19.9	20.0	32.40	9.69	24.98	
25.0	25.2	32.54	8.83	25.22	5.37
29.8	29.9	32.65	8.51	25.35	
35.0	35.2	32.65	8.41	25.37	
39.9	40.1	32.77	8.23	25.49	
44.8	45.0	32.84	8.15	25.56	
49.8	50.1	32.95	8.09	25.65	4.63
59.6	59.9	33.18	7.98	25.85	
69.6	70.0	33.41	7.79	26.06	
74.7	75.1	33.53	7.84	26.14	3.53
79.6	80.0	33.60	7.84	26.20	
89.6	90.1	33.69	7.70	26.29	
100.4	101.1	33.80	7.39	26.42	2.47
110.4	111.1	33.87	7.05	26.53	
120.2	120.9	33.90	6.88	26.57	
125.2	126.0	33.92	6.74	26.60	1.92
130.2	131.1	33.91	6.72	26.60	
132.1	133.0	33.92	6.72	26.60	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 41.46
DATE 12/ 6/80
TIME (PST) 0331

TAPE: U00454 -351
LONG W 126 17.57
PASS NO. 69
STN: W.B. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.3	4.4	32.06	11.69	24.36
4.9	4.9	32.05	11.70	24.36
10.2	10.3	32.06	11.70	24.36
15.0	15.1	32.08	11.43	24.43
20.5	20.6	32.19	9.50	24.84
24.7	24.9	32.38	9.15	25.05
29.9	30.0	32.37	8.85	25.09
34.8	34.9	32.52	8.74	25.22
39.8	40.0	32.59	8.67	25.28
44.8	45.1	32.63	8.41	25.36
49.6	49.9	32.68	8.28	25.42
59.8	60.2	32.92	8.13	25.63
69.6	70.0	33.05	8.04	25.74
79.6	80.1	33.24	7.91	25.91
89.6	90.1	33.39	7.80	26.04
100.5	101.1	33.62	7.73	26.23
110.4	111.1	33.84	7.27	26.47
120.3	121.1	33.87	7.15	26.51
130.1	131.0	33.91	6.99	26.56
140.3	141.2	33.93	6.82	26.60
150.0	151.0	33.94	6.69	26.63
159.9	160.9	33.94	6.57	26.64
169.9	171.1	33.94	6.56	26.65
179.9	181.1	33.94	6.52	26.65
189.6	190.9	33.96	6.36	26.69
199.6	201.0	33.96	6.33	26.69
225.0	226.5	33.96	6.22	26.70
250.2	252.0	33.97	6.09	26.73
274.8	276.8	33.97	5.93	26.75
299.8	302.0	33.99	5.67	26.80
324.6	327.0	34.00	5.57	26.81
350.3	353.0	34.00	5.45	26.83
375.2	378.1	34.01	5.36	26.85
400.1	403.2	34.01	5.28	26.86
424.8	428.2	34.02	5.22	26.88
450.5	454.0	34.04	5.12	26.90
475.0	478.9	34.04	5.03	26.92
487.2	491.1	34.05	4.95	26.93

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 12 CODE
LAT N 48 37.34
DATE 12/ 6/80
TIME (PST) 0424

TAPE: U00454 -352
LONG W 126 23.47
PASS NO. 71
STN: W.B. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.4	2.4	32.14	11.63	24.44	
5.1	5.1	32.13	11.65	24.43	
10.0	10.0	32.12	11.65	24.42	
14.9	15.0	32.12	11.66	24.41	
19.9	20.0	32.12	11.67	24.41	
24.9	25.1	32.32	10.22	24.83	6.80
29.8	30.0	32.25	9.97	24.81	
34.8	35.0	32.27	9.83	24.85	
39.8	40.0	32.31	9.54	24.93	
44.7	44.9	32.37	9.31	25.01	
49.9	50.1	32.43	8.87	25.13	5.42
59.6	59.9	32.55	8.57	25.27	
69.7	70.1	32.73	8.22	25.47	
74.4	74.9	32.83	8.15	25.55	5.02
79.6	80.1	32.89	8.11	25.60	
90.4	91.0	33.01	8.02	25.71	
99.5	100.1	33.24	7.89	25.91	3.69
110.3	111.0	33.41	7.79	26.06	
120.3	121.1	33.53	7.72	26.17	
125.3	126.1	33.61	7.69	26.23	3.11
130.4	131.2	33.65	7.67	26.27	
140.2	141.1	33.70	7.63	26.31	
150.1	151.1	33.78	7.45	26.40	2.60
159.8	160.9	33.85	7.21	26.49	
170.0	171.1	33.92	6.81	26.59	
179.9	181.1	33.94	6.49	26.66	
189.8	191.0	33.95	6.40	26.68	
199.7	201.0	33.98	6.15	26.73	1.81
224.5	226.0	33.99	5.77	26.78	
250.1	251.9	33.99	5.66	26.80	1.67
275.0	277.0	34.00	5.55	26.82	
299.8	301.9	34.01	5.42	26.84	1.44
324.6	327.0	34.01	5.35	26.85	
349.5	352.1	34.02	5.21	26.88	
375.3	378.1	34.03	5.15	26.89	
399.9	403.0	34.04	5.09	26.90	
424.6	428.0	34.05	5.03	26.92	
450.5	454.1	34.07	4.89	26.95	
475.1	478.9	34.08	4.80	26.97	
500.0	504.0	34.09	4.78	26.98	.84
502.5	506.6	34.09	4.77	26.98	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13   CODE                              TAPE: U00454   -363
LAT  N 48 53.19                                   LONG W 125 36.12
DATE 13/ 8/80                                     PASS NO.  2
TIME (PST) 1440                                   STN: A.P. 1

  DEPTH      PRESS       SAL       TEMP     SIGMA-T
     .8         .8     31.67      13.94      23.63
    2.0        2.0     31.67      13.91      23.64
    5.0        5.1     31.67      13.81      23.65
   10.0       10.0     31.87      11.85      24.19
   15.0       15.1     32.07      10.13      24.65
   19.8       19.9     32.14       9.85      24.75
   24.9       25.1     32.23       9.58      24.86
   29.9       30.0     32.32       9.39      24.96
   34.8       35.0     32.35       9.32      25.00
   39.8       40.0     32.37       9.29      25.01
   44.8       45.0     32.37       9.29      25.01
   49.7       50.0     32.41       9.21      25.06
   55.4       55.7     32.49       9.07      25.14

CRUISE NO:  13   CODE                             TAPE: U00454   -364
LAT  N 48 49.32                                   LONG W 125 41.36
DATE 13/ 8/80                                     PASS NO.  3
TIME (PST) 1518                                   STN: A.P. 2

  DEPTH      PRESS       SAL       TEMP     SIGMA-T    OXYGEN
    3.5        3.6     31.78      13.67      23.77
    5.0        5.0     31.77      13.69      23.76
    9.9       10.0     31.82      11.91      24.14
   15.1       15.2     31.88      11.17      24.32
   19.7       19.8     31.95      10.36      24.51
   25.0       25.2     32.06       9.78      24.70     4.48
   29.9       30.1     32.19       9.46      24.85
   34.8       34.9     32.33       9.20      25.00
   39.9       40.1     32.47       8.98      25.14
   44.8       45.0     32.67       8.71      25.34
   49.7       50.0     32.75       8.61      25.42     2.99
   53.2       53.5     32.77       8.59      25.44
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13    CODE                           TAPE: U00454    -365
LAT   N 48 45.39                                LONG W 125 47.05
DATE 13/ 8/80                                   PASS NO.   5
TIME (PST) 1604                                 STN: A.P. 3

  DEPTH       PRESS        SAL        TEMP     SIGMA-T
     .8          .8      31.72       12.82      23.89
    2.0         2.0      31.75       12.84      23.91
    5.0         5.0      31.73       12.84      23.89
    9.9        10.0      31.84       10.41      24.42
   14.8        14.9      31.96       10.03      24.58
   19.9        20.0      32.04        9.83      24.67
   24.9        25.0      32.14        9.56      24.80
   29.8        30.0      32.25        9.39      24.90
   34.9        35.1      32.32        9.31      24.97
   39.7        39.9      32.43        9.05      25.10
   44.7        45.0      32.47        8.96      25.14
   49.8        50.0      32.65        8.71      25.33
   59.7        60.0      32.85        8.46      25.52
   69.7        70.1      33.16        8.05      25.83
   69.7        70.1      33.16        8.05      25.83

CRUISE NO:  13    CODE                          TAPE: U00454    -366
LAT   N 48 41.41                                LONG W 125 52.38
DATE 13/ 8/80                                   PASS NO.   7
TIME (PST) 1645                                 STN: A.P. 4

  DEPTH       PRESS        SAL        TEMP     SIGMA-T    OXYGEN
    2.0         2.0      31.69       12.28      23.97
    5.0         5.0      31.69       12.29      23.97
   10.0        10.0      31.69       12.25      23.98
   14.9        14.9      31.72       10.57      24.30
   19.9        20.0      31.93       10.06      24.55
   24.7        24.8      32.14        9.57      24.79    3.91
   29.8        29.9      32.29        9.26      24.96
   34.8        34.9      32.58        8.83      25.25
   39.8        40.0      32.88        8.40      25.55
   44.7        44.9      32.96        8.28      25.63
   50.5        50.8      32.98        8.25      25.66    2.77
   59.7        60.0      33.16        8.03      25.83    2.72
   64.5        64.9      33.22        7.93      25.89
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13 CODE
LAT N 48 37.36
DATE 13/ 8/80
TIME (PST) 1735

TAPE: U00454 -367
LONG W 125 58.16
PASS NO. 9
STN: A.P. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.6	1.6	31.66	11.94	24.01
4.9	4.9	31.66	11.94	24.01
10.0	10.0	31.94	12.29	24.17
14.8	14.9	32.40	10.38	24.86
19.9	20.0	32.46	9.76	25.01
25.0	25.1	32.63	9.00	25.27
29.8	30.0	32.68	8.65	25.36
34.8	35.0	32.80	8.31	25.51
39.7	39.9	32.85	8.19	25.56
44.8	45.1	32.92	8.13	25.63
49.6	49.9	33.00	8.11	25.69
59.7	60.1	33.26	7.89	25.92
69.5	70.0	33.43	7.72	26.08
79.6	80.1	33.60	7.49	26.25
89.6	90.2	33.77	7.20	26.42
99.9	100.6	33.85	6.80	26.54
102.2	102.8	33.85	6.80	26.54

CRUISE NO: 13 CODE
LAT N 48 33.24
DATE 13/ 8/80
TIME (PST) 1819

TAPE: U00454 -368
LONG W 126 4.00
PASS NO. 11
STN: A.P. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
1.8	1.8	32.29	12.88	24.32	
4.8	4.9	32.30	12.88	24.33	
10.0	10.0	32.31	12.80	24.35	
14.9	15.0	32.38	11.68	24.62	
19.8	19.9	32.48	10.52	24.90	
24.8	24.9	32.50	9.53	25.08	5.06
30.0	30.2	32.62	8.87	25.27	
34.8	35.0	32.65	8.64	25.34	
39.6	39.9	32.69	8.43	25.40	
44.7	45.0	32.82	8.28	25.52	
49.6	49.9	32.90	8.20	25.60	5.04
59.7	60.0	33.25	7.85	25.93	
69.6	70.0	33.49	7.57	26.15	
74.6	75.0	33.61	7.45	26.26	4.15
79.6	80.1	33.65	7.42	26.30	
90.5	91.0	33.70	7.37	26.34	
100.4	101.0	33.79	7.32	26.43	3.51
110.2	110.9	33.85	7.25	26.48	
120.2	120.9	33.91	7.16	26.54	
125.3	126.1	33.90	7.02	26.55	2.79
130.1	130.9	33.90	6.84	26.58	
137.7	138.6	33.92	6.62	26.62	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13 CODE TAPE: U00454 -369
LAT N 48 29.06 LONG W 126 9.48
DATE 13/ 8/80 PASS NO. 13
TIME (PST) 1921 STN: A.P. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.4	2.4	32.33	12.71	24.39
4.9	4.9	32.34	12.70	24.39
9.9	9.9	32.34	12.70	24.39
14.9	14.9	32.33	12.38	24.45
19.8	19.9	32.49	10.40	24.93
25.0	25.1	32.54	9.37	25.13
29.8	30.0	32.56	8.88	25.23
34.8	35.0	32.62	8.65	25.31
40.0	40.2	32.65	8.53	25.35
44.7	45.0	32.69	8.40	25.40
49.8	50.1	32.78	8.35	25.48
59.7	60.0	32.99	8.08	25.68
69.7	70.1	33.19	7.88	25.87
79.6	80.1	33.38	7.66	26.05
89.6	90.1	33.71	7.50	26.33
100.5	101.1	33.75	7.59	26.35
110.2	110.9	33.82	7.54	26.42
120.3	121.0	33.86	7.47	26.46
130.1	130.9	33.88	7.40	26.48
140.1	141.0	33.89	7.38	26.50
149.9	150.9	33.93	7.25	26.54
159.9	161.0	33.92	7.20	26.55
170.0	171.2	33.94	7.07	26.58
179.9	181.2	33.95	6.95	26.60
189.7	191.0	33.96	6.83	26.62
199.7	201.1	33.97	6.73	26.65
225.5	227.1	34.00	6.28	26.73
226.5	228.1	34.00	6.23	26.74

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  13    CODE                              TAPE: U00454    -370
LAT  N 48 24.40                                     LONG W 126 15.42
DATE 13/ 8/80                                       PASS NO. 15
TIME (PST) 2017                                     STN: A.P. 8

  DEPTH      PRESS       SAL        TEMP     SIGMA-T
    1.9        1.9      32.38      12.88      24.39
    5.7        5.7      32.38      12.86      24.40
    9.9       10.0      32.39      12.86      24.41
   14.9       15.0      32.39      12.79      24.41
   20.5       20.6      32.43      11.73      24.64
   25.0       25.1      32.45      11.30      24.74
   29.8       30.0      32.46      10.60      24.87
   34.9       35.1      32.50      10.10      24.99
   39.9       40.1      32.55       9.28      25.16
   44.8       45.0      32.57       8.98      25.22
   49.7       50.0      32.59       8.80      25.26
   59.6       59.9      32.70       8.30      25.43
   69.6       70.0      32.93       8.14      25.63
   79.6       80.1      33.14       7.97      25.82
   89.7       90.2      33.38       7.65      26.05
  100.4      101.0      33.54       7.53      26.19
  110.5      111.2      33.64       7.42      26.29
  120.2      121.0      33.72       7.24      26.38
  130.2      131.1      33.76       7.22      26.41
  139.9      140.8      33.80       7.18      26.45
  150.1      151.1      33.85       7.16      26.49
  159.9      161.0      33.90       7.10      26.54
  170.0      171.1      33.93       7.02      26.57
  179.8      181.0      33.94       6.91      26.60
  189.7      191.0      33.95       6.78      26.63
  199.7      201.0      33.95       6.71      26.64
  225.5      227.1      33.96       6.40      26.68
  250.1      251.8      33.98       6.22      26.72
  275.2      277.2      34.01       6.19      26.75
  299.8      302.0      34.01       5.91      26.78
  325.5      327.9      34.04       5.85      26.82
  350.2      352.9      34.05       5.74      26.84
  375.4      378.2      34.06       5.64      26.86
  399.8      402.9      34.07       5.48      26.88
  425.3      428.7      34.08       5.39      26.90
  449.5      453.1      34.09       5.26      26.92
  475.4      479.2      34.09       5.15      26.94
  484.0      487.9      34.09       5.05      26.95
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13 CODE
LAT N 48 8.50
DATE 13/ 8/80
TIME (PST) 2237

TAPE: U00454 -371
LONG W 126 .00
PASS NO. 17
STN: 111

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.3	3.3	32.22	13.80	24.08
4.9	4.9	32.21	13.81	24.08
9.9	9.9	32.22	13.81	24.08
14.9	14.9	32.21	13.80	24.08
19.8	19.9	32.23	12.87	24.28
24.8	25.0	32.38	10.89	24.76
29.8	29.9	32.49	9.93	25.01
34.9	35.1	32.55	9.37	25.15
39.9	40.1	32.57	9.27	25.17
44.6	44.9	32.59	9.04	25.23
49.6	49.8	32.60	8.78	25.27
59.5	59.9	32.66	8.48	25.37
69.5	69.9	32.86	8.40	25.54
79.6	80.0	33.05	8.40	25.69
90.5	91.0	33.29	8.36	25.88
100.3	100.9	33.40	8.18	26.00
110.4	111.0	33.57	7.95	26.16
120.3	121.0	33.62	7.85	26.22
130.1	130.9	33.69	7.70	26.29
140.7	141.5	33.74	7.54	26.36
150.2	151.1	33.81	7.44	26.42
159.9	160.9	33.83	7.34	26.45
169.8	170.9	33.87	7.26	26.49
179.9	181.0	33.91	7.20	26.53
189.7	191.0	33.93	7.13	26.56
199.6	200.9	33.95	7.06	26.58
224.5	226.0	33.97	6.93	26.62
250.3	252.1	33.99	6.70	26.67
275.1	277.0	33.99	6.51	26.69
299.8	302.0	34.00	6.27	26.73
324.8	327.2	33.99	6.00	26.76
350.4	353.0	34.02	5.83	26.80
375.2	378.0	34.05	5.68	26.84
400.0	403.1	34.06	5.61	26.86
424.6	427.9	34.08	5.45	26.89
449.6	453.1	34.09	5.32	26.92
475.0	478.8	34.11	5.19	26.95
500.0	504.0	34.12	5.04	26.97
510.6	514.7	34.13	4.97	26.99

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  13   CODE                              TAPE: U00454    -372
LAT  N 48 10.60                                    LONG W 125 56.20
DATE 13/ 8/80                                      PASS NO. 19
TIME (PST) 2323                                    STN: 110

  DEPTH       PRESS        SAL        TEMP    SIGMA-T
    2.0         2.0      32.24       13.81     24.09
    4.9         4.9      32.23       13.80     24.09
   10.1        10.1      32.21       13.66     24.11
   15.0        15.0      32.22       13.48     24.15
   19.9        19.9      32.28       12.28     24.43
   24.8        25.0      32.41       10.99     24.76
   30.0        30.2      32.46       10.35     24.91
   34.8        35.0      32.50        9.89     25.02
   39.8        40.0      32.56        9.45     25.14
   44.7        44.9      32.58        9.28     25.18
   49.6        49.9      32.60        8.95     25.25
   59.6        59.9      32.67        8.33     25.39
   69.7        70.1      32.91        8.37     25.58
   79.7        80.2      33.14        8.46     25.75
   89.6        90.1      33.37        8.29     25.96
   99.5       100.1      33.47        8.19     26.04
  110.2       110.9      33.62        7.97     26.20
  120.2       121.0      33.66        7.84     26.25
  130.2       131.0      33.76        7.69     26.35
  140.2       141.1      33.82        7.63     26.40
  150.1       151.0      33.87        7.58     26.45
  159.8       160.8      33.90        7.53     26.48
  169.9       171.0      33.91        7.48     26.49
  179.8       180.9      33.92        7.38     26.52
  189.8       191.0      33.93        7.26     26.54
  199.7       201.0      33.94        7.12     26.57
  225.5       227.0      33.97        6.89     26.63
  250.3       252.1      33.99        6.61     26.67
  275.2       277.1      34.00        6.45     26.70
  300.0       302.1      34.01        6.30     26.74
  324.6       327.0      34.02        6.11     26.77
  350.4       353.0      34.03        5.94     26.79
  375.1       377.9      34.05        5.81     26.82
  400.0       403.1      34.04        5.55     26.85
  424.8       428.1      34.06        5.35     26.89
  450.5       454.0      34.08        5.33     26.91
  475.2       479.0      34.10        5.27     26.93
  496.7       500.7      34.12        5.13     26.96
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13   CODE
LAT N 48 12.90
DATE 14/ 8/80
TIME (PST) 0008

TAPE: U00454   -373
LONG W 125 52.00
PASS NO. 21
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.8	1.8	32.28	13.28	24.23
5.0	5.0	32.28	13.27	24.23
10.0	10.1	32.28	13.27	24.24
14.9	15.0	32.30	13.14	24.28
20.0	20.1	32.37	11.36	24.67
24.7	24.9	32.42	10.55	24.84
29.9	30.0	32.55	9.68	25.09
35.4	35.6	32.57	9.12	25.20
39.7	39.9	32.59	8.89	25.25
44.9	45.2	32.61	8.69	25.29
49.9	50.2	32.60	8.58	25.31
59.6	59.9	32.73	8.30	25.45
69.6	70.0	32.84	8.29	25.54
79.6	80.0	33.10	8.32	25.74
89.4	90.0	33.31	8.33	25.90
99.6	100.2	33.51	8.15	26.08
110.3	110.9	33.64	7.98	26.21
120.4	121.1	33.77	7.80	26.34
130.2	131.0	33.82	7.66	26.40
140.2	141.0	33.86	7.54	26.45
150.1	151.1	33.90	7.35	26.51
159.8	160.9	33.93	7.23	26.54
169.8	170.9	33.94	7.18	26.56
179.8	181.0	33.96	7.00	26.60
189.8	191.0	33.96	6.93	26.61
199.6	201.0	33.97	6.82	26.63
224.6	226.2	33.99	6.49	26.69
250.3	252.0	34.00	6.27	26.73
275.1	277.1	34.00	6.17	26.75
300.0	302.2	34.02	6.03	26.77
324.6	327.0	34.03	5.93	26.79
350.3	352.9	34.03	5.91	26.80
375.2	378.1	34.04	5.82	26.82
399.9	403.0	34.05	5.74	26.83
424.7	428.0	34.06	5.59	26.86
449.5	453.0	34.07	5.51	26.88
475.2	479.0	34.08	5.40	26.90
499.0	503.0	34.08	5.37	26.91

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13 CODE TAPE: U00454 -374
LAT N 48 15.10 LONG W 125 47.70
DATE 14/ 8/80 PASS NO. 23
TIME (PST) 0053 STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.2	2.2	32.18	12.61	24.29
4.9	4.9	32.18	12.61	24.29
9.9	10.0	32.25	12.43	24.38
14.8	14.9	32.46	10.80	24.83
19.9	20.0	32.52	9.84	25.05
25.1	25.2	32.56	9.11	25.19
29.7	29.8	32.57	8.85	25.24
34.9	35.1	32.60	8.67	25.29
39.6	39.9	32.61	8.58	25.31
44.7	44.9	32.63	8.44	25.35
49.6	49.8	32.66	8.35	25.39
60.2	60.5	32.77	8.22	25.49
69.5	69.9	32.92	8.11	25.62
79.5	80.0	33.28	8.13	25.91
90.5	91.0	33.49	7.96	26.10
100.3	100.9	33.64	8.00	26.20
110.2	110.9	33.78	7.79	26.34
120.3	121.1	33.82	7.69	26.39
130.2	131.0	33.86	7.53	26.45
140.2	141.1	33.88	7.44	26.48
150.1	151.1	33.91	7.31	26.52
159.9	161.0	33.92	7.13	26.55
169.8	171.0	33.93	7.08	26.56
179.7	180.9	33.93	6.98	26.58
189.7	191.0	33.94	6.93	26.59
199.8	201.2	33.94	6.87	26.60
225.3	226.9	33.97	6.66	26.65
229.4	231.0	33.98	6.55	26.68

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13   CODE                                  TAPE: U00454    -375
LAT  N 48 18.60                                       LONG W 125 41.20
DATE 14/ 8/80                                         PASS NO. 25
TIME (PST) 0144                                       STN: 107

  DEPTH      PRESS        SAL        TEMP     SIGMA-T    OXYGEN
    2.2        2.2      32.00       11.25      24.40
    4.7        4.7      32.01       11.24      24.41
   10.0       10.0      32.02       11.22      24.42      6.19
   15.0       15.1      32.08       11.10      24.49
   20.1       20.2      32.25        9.82      24.83
   24.9       25.0      32.44        9.90      24.97      3.82
   30.0       30.1      32.60        9.31      25.20
   34.8       35.0      32.63        8.99      25.27
   39.7       39.9      32.79        8.64      25.45
   44.8       45.0      32.85        8.46      25.52
   50.4       50.7      32.96        8.17      25.65      4.28
   59.7       60.0      33.12        8.02      25.80
   69.6       70.1      33.34        7.82      26.00
   74.5       75.0      33.43        7.69      26.09      4.01
   80.4       80.9      33.50        7.57      26.16
   89.5       90.1      33.67        7.40      26.32
  100.4      101.0      33.80        7.62      26.39      3.15
  110.2      110.9      33.86        7.49      26.46
  120.2      121.0      33.89        7.37      26.49
  125.2      126.0      33.92        7.20      26.54      2.75
  130.1      131.0      33.92        7.17      26.54
  140.1      141.0      33.94        6.93      26.60      2.47
  150.0      151.0      33.95        6.92      26.60
  152.8      153.8      33.94        6.93      26.60
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13   CODE   TAPE: U00454   -376
LAT N 48 22.00   LONG W 125 34.70
DATE 14/ 8/80   PASS NO. 27
TIME (PST) 0308   STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.5	1.5	32.35	10.76	24.76
4.8	4.8	32.36	10.82	24.76
10.0	10.0	32.47	10.87	24.83
14.8	14.9	32.71	10.20	25.13
19.9	20.0	33.08	8.65	25.67
25.0	25.1	33.16	8.34	25.78
29.8	30.0	33.26	8.10	25.90
34.8	35.0	33.32	7.98	25.96
39.8	40.0	33.45	7.69	26.11
44.7	45.0	33.50	7.59	26.15
49.7	50.0	33.57	7.42	26.24
59.8	60.1	33.66	7.21	26.33
70.6	71.0	33.70	7.11	26.38
79.6	80.1	33.72	7.07	26.40
89.5	90.1	33.77	6.95	26.46
100.3	101.0	33.80	6.87	26.49
110.2	111.0	33.84	6.79	26.53
120.2	121.0	33.92	6.53	26.64
130.2	131.1	33.95	6.43	26.67
139.9	140.9	33.95	6.42	26.67
147.8	148.8	33.96	6.41	26.68

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13   CODE   TAPE: U00454   -377
LAT   N 48 25.50   LONG W 125 28.30
DATE 14/ 8/80   PASS NO. 29
TIME (PST) 0348   STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
1.9	1.9	32.56	12.24	24.65	
4.8	4.8	32.58	12.24	24.66	
10.0	10.0	32.58	12.24	24.66	7.20
14.9	15.0	32.65	11.41	24.88	
19.8	19.9	32.77	10.35	25.16	
25.0	25.1	32.94	9.45	25.44	3.44
29.9	30.1	33.12	8.66	25.70	
34.8	35.0	33.20	8.41	25.80	
39.7	39.9	33.34	8.01	25.97	
44.6	44.9	33.47	7.67	26.12	
49.7	50.0	33.57	7.43	26.24	2.21
59.5	59.9	33.75	7.00	26.44	
69.7	70.1	33.81	6.86	26.50	
75.4	75.9	33.85	6.77	26.54	1.56
79.6	80.1	33.86	6.71	26.56	
90.3	90.9	33.88	6.67	26.58	
100.3	101.0	33.88	6.66	26.59	1.38
110.2	110.9	33.90	6.63	26.60	
120.1	120.9	33.90	6.63	26.60	
125.1	126.0	33.90	6.63	26.60	1.28
130.2	131.1	33.90	6.63	26.60	
132.1	133.0	33.90	6.63	26.61	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13   CODE                          TAPE: U00454    -378
LAT  N 48 28.90                               LONG W 125 21.80
DATE 14/ 8/80                                 PASS NO. 31
TIME (PST) 0454                               STN: 104

 DEPTH       PRESS        SAL        TEMP     SIGMA-T
   2.7         2.7       32.55      11.65     24.75
   5.1         5.1       32.61      11.53     24.83
  10.0        10.1       32.61      11.13     24.89
  14.9        15.0       32.80      10.14     25.22
  19.9        20.0       32.87       9.71     25.34
  24.8        24.9       32.99       9.20     25.52
  29.8        30.0       33.12       8.65     25.70
  34.8        35.0       33.22       8.33     25.83
  39.6        39.9       33.36       7.91     26.00
  44.7        45.0       33.48       7.63     26.14
  49.8        50.1       33.59       7.38     26.26
  59.6        60.0       33.70       7.12     26.38
  69.6        70.0       33.76       6.98     26.45
  80.4        80.9       33.82       6.81     26.52
  90.3        90.9       33.88       6.66     26.58
 100.2       100.9       33.92       6.56     26.63
 110.2       110.9       33.93       6.51     26.65
 120.2       121.0       33.94       6.48     26.65
 130.2       131.1       33.94       6.48     26.65
 140.0       141.0       33.94       6.47     26.66
 149.9       151.0       33.94       6.47     26.66
 149.9       151.0       33.94       6.47     26.66
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13 CODE
LAT N 48 32.20
DATE 14/ 8/80
TIME (PST) 0532

TAPE: U00454 -379
LONG W 125 15.50
PASS NO. 33
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.2	2.2	32.49	11.99	24.64	
5.0	5.0	32.50	11.97	24.65	
9.9	9.9	32.60	11.23	24.87	
14.9	15.0	32.90	9.49	25.40	
19.7	19.8	33.08	8.79	25.65	
24.6	24.8	33.23	8.25	25.85	2.89
29.8	30.0	33.30	8.06	25.93	
34.7	34.9	33.43	7.76	26.08	
39.7	39.9	33.48	7.65	26.13	
44.7	45.0	33.54	7.52	26.20	
49.7	50.0	33.57	7.44	26.23	2.17
59.5	59.9	33.68	7.18	26.35	
70.4	70.9	33.78	6.94	26.47	
74.6	75.1	33.83	6.83	26.52	1.87
80.5	81.1	33.86	6.73	26.56	
90.5	91.1	33.90	6.63	26.60	
100.3	101.0	33.92	6.56	26.63	1.65
103.4	104.1	33.92	6.55	26.63	

CRUISE NO: 13 CODE
LAT N 48 35.60
DATE 14/ 8/80
TIME (PST) 0624

TAPE: U00454 -380
LONG W 125 9.00
PASS NO. 35
STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.3	2.3	31.68	11.30	24.14
5.0	5.0	31.70	11.25	24.16
10.0	10.0	31.91	10.49	24.46
15.0	15.1	32.22	9.77	24.82
19.9	20.1	32.32	9.35	24.96
24.9	25.0	32.41	9.08	25.08
29.8	30.0	32.91	8.54	25.56
34.9	35.1	33.13	8.15	25.79
39.8	40.1	33.18	8.12	25.83
44.8	45.1	33.19	8.13	25.84
49.7	49.9	33.25	8.10	25.89
59.6	60.0	33.36	7.93	25.99
69.5	69.9	33.45	7.74	26.10
79.6	80.1	33.54	7.54	26.19
90.4	90.9	33.64	7.28	26.31
100.4	101.1	33.83	6.84	26.52
103.2	103.8	33.87	6.73	26.57

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 13 CODE
LAT N 48 39.00
DATE 14/ 8/80
TIME (PST) 0710

TAPE: U00454 -381
LONG W 125 2.50
PASS NO. 37
STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.9	4.9	31.67	11.06	24.17	
9.9	10.0	31.83	10.20	24.45	4.19
14.9	14.9	31.89	9.83	24.56	
19.9	20.0	32.12	9.38	24.81	
24.9	25.0	32.62	8.71	25.30	3.32
29.9	30.0	32.66	8.67	25.34	
34.8	35.0	32.73	8.57	25.41	
39.7	39.9	32.80	8.49	25.48	3.20
44.7	45.0	32.90	8.38	25.57	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 24.40
DATE 22/ 9/80
TIME (PST) 1500

TAPE: U00454 -382
LONG W 126 15.42
PASS NO. 1
STN: A.P. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.1	2.1	32.20	13.45	24.14	
5.0	5.0	32.20	13.44	24.14	
10.1	10.2	32.20	13.29	24.17	
15.0	15.1	32.28	12.76	24.34	
20.0	20.1	32.38	11.41	24.66	
25.0	25.1	32.56	9.70	25.10	6.05
29.9	30.0	32.64	9.02	25.27	
34.8	35.0	32.69	8.78	25.35	
39.8	40.1	32.77	8.57	25.44	
44.8	45.0	32.84	8.43	25.52	
49.6	49.9	32.92	8.33	25.60	4.68
59.7	60.0	33.09	8.14	25.76	
69.4	69.8	33.24	8.15	25.87	
74.5	74.9	33.34	8.09	25.96	4.24
79.6	80.1	33.42	7.98	26.04	
90.5	91.0	33.52	7.71	26.16	
100.4	101.1	33.62	7.50	26.26	4.05
110.3	111.0	33.73	7.46	26.36	
119.8	120.6	33.79	7.32	26.42	
125.2	126.0	33.82	7.36	26.44	3.60
130.3	131.1	33.83	7.35	26.45	
140.1	141.1	33.89	7.40	26.49	
150.2	151.2	33.92	7.32	26.52	3.01
160.0	161.1	33.93	7.21	26.55	
169.8	171.0	33.94	7.13	26.57	
179.8	181.0	33.95	7.04	26.59	
189.7	191.0	33.96	6.95	26.60	
199.5	200.9	33.96	6.88	26.62	2.14
225.4	227.0	33.97	6.65	26.66	
250.2	252.0	33.97	6.48	26.68	2.23
275.0	277.0	34.00	6.35	26.72	
299.9	302.1	34.01	6.23	26.74	1.69
324.5	326.9	34.02	6.11	26.76	
350.4	353.0	34.02	6.00	26.78	
375.2	378.1	34.03	5.88	26.81	
399.8	402.9	34.03	5.72	26.83	
424.6	427.9	34.04	5.61	26.85	
450.4	454.0	34.06	5.46	26.88	
475.2	479.0	34.04	5.31	26.88	
497.1	501.1	34.09	5.25	26.93	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 29.06
DATE 22/ 9/80
TIME (PST) 1631

TAPE: U00454 -383
LONG W 126 9.48
PASS NO. 3
STN: A.P. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.9	2.9	32.20	12.80	24.27
5.0	5.0	32.22	12.78	24.28
10.5	10.5	32.23	12.92	24.26
14.8	14.9	32.49	10.71	24.88
19.9	20.0	32.65	8.97	25.29
24.8	25.0	32.70	8.68	25.37
29.9	30.1	32.74	8.55	25.42
34.8	34.9	32.85	8.45	25.52
40.0	40.2	32.90	8.40	25.57
44.8	45.1	32.98	8.32	25.65
49.6	49.9	33.04	8.27	25.70
59.7	60.1	33.14	8.17	25.79
69.6	70.0	33.32	8.03	25.95
80.4	80.9	33.54	7.92	26.14
90.5	91.1	33.65	7.80	26.24
100.3	100.9	33.72	7.74	26.31
110.2	110.9	33.81	7.65	26.39
120.2	121.0	33.85	7.56	26.44
130.2	131.0	33.89	7.49	26.47
140.0	141.0	33.92	7.33	26.53
150.1	151.1	33.94	7.17	26.56
159.8	160.9	33.95	7.06	26.59
169.8	170.9	33.97	6.85	26.63
179.8	181.0	33.97	6.81	26.64
189.6	191.0	33.98	6.71	26.65
199.6	201.0	33.98	6.71	26.66
225.5	227.1	33.99	6.55	26.68
250.1	251.9	33.99	6.48	26.69
252.8	254.7	33.99	6.48	26.70

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE                                TAPE: U00454   -384
LAT  N 48 33.24                                     LONG W 126  4.00
DATE 22/ 9/80                                       PASS NO.  5
TIME (PST) 1725                                     STN: A.P. 6

 DEPTH      PRESS        SAL        TEMP     SIGMA-T    OXYGEN
   2.5        2.5      32.26       12.61      24.35
   5.3        5.3      32.33       12.44      24.44
  10.0       10.0      32.30       12.26      24.45
  15.0       15.0      32.46       10.54      24.80
  19.9       20.0      32.56        9.48      25.14
  24.9       25.1      32.60        9.06      25.24      6.02
  29.8       30.0      32.67        8.63      25.35
  34.9       35.1      32.77        8.43      25.47
  39.8       40.0      32.87        8.37      25.55
  44.7       45.0      32.94        8.33      25.61
  49.8       50.1      33.02        8.24      25.68      4.50
  59.7       60.1      33.22        8.08      25.86
  69.5       70.0      33.46        7.91      26.08
  74.5       75.0      33.59        7.78      26.20      3.36
  80.5       81.0      33.68        7.38      26.33
  89.5       90.1      33.80        7.62      26.39
 100.4      101.0      33.82        7.23      26.46      1.64
 110.1      110.8      33.85        6.84      26.54
 120.3      121.1      33.85        6.83      26.54
 125.2      126.1      33.86        6.82      26.54      1.32
 130.2      131.0      33.86        6.82      26.55
 139.9      140.9      33.86        6.82      26.55
 147.1      148.1      33.86        6.82      26.55
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE TAPE: U00454 -385
LAT N 48 37.36 LONG W 125 58.16
DATE 22/ 9/80 PASS NO. 7
TIME (PST) 1825 STN: A.P. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.3	2.3	31.85	11.85	24.17
4.9	5.0	31.89	11.87	24.20
10.0	10.1	32.51	10.06	25.00
15.0	15.0	32.54	9.39	25.13
20.0	20.1	32.62	9.16	25.23
24.8	25.0	32.78	8.83	25.41
30.0	30.1	32.84	8.74	25.47
34.8	35.0	32.97	8.53	25.61
39.7	40.0	33.09	8.38	25.72
44.8	45.1	33.21	8.17	25.85
49.6	49.8	33.22	8.14	25.86
59.6	60.0	33.32	8.01	25.95
69.6	70.0	33.39	7.92	26.03
80.4	80.9	33.45	7.74	26.10
90.4	91.0	33.61	7.45	26.26
100.4	101.0	33.75	7.12	26.42
105.3	106.0	33.75	7.09	26.43

CRUISE NO: 14 CODE TAPE: U00454 -386
LAT N 48 41.41 LONG W 125 52.38
DATE 22/ 9/80 PASS NO. 9
TIME (PST) 2014 STN: A.P. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.2	3.3	31.32	10.88	23.93	
5.0	5.1	31.38	10.89	23.98	
9.9	10.0	31.36	10.93	23.96	
14.9	14.9	31.84	10.13	24.46	
19.9	20.0	32.06	10.01	24.66	
24.9	25.0	32.29	9.48	24.93	3.70
29.9	30.1	32.41	9.23	25.06	
35.0	35.1	32.80	9.07	25.38	
39.8	40.0	32.85	8.86	25.45	
44.8	45.0	32.88	8.71	25.51	
49.8	50.1	32.99	8.52	25.62	3.03
59.7	60.0	33.11	8.32	25.74	
59.7	60.0	33.11	8.32	25.74	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE TAPE: U00454 -387
LAT N 48 45.39 LONG W 125 47.05
DATE 22/ 9/80 PASS NO. 11
TIME (PST) 2107 STN: A.P. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.2	2.2	31.68	11.69	24.07
4.9	5.0	31.57	12.00	23.93
9.9	9.9	31.85	11.30	24.28
14.7	14.8	31.99	10.47	24.53
19.8	19.9	32.02	10.27	24.58
24.9	25.0	32.10	9.92	24.71
29.7	29.9	32.24	9.53	24.87
34.9	35.0	32.28	9.48	24.92
39.7	40.0	32.33	9.39	24.97
44.7	44.9	32.39	9.30	25.03
49.8	50.0	32.52	9.12	25.16
59.8	60.1	32.58	9.04	25.22
62.5	62.8	32.61	8.99	25.25

CRUISE NO: 14 CODE TAPE: U00454 -388
LAT N 48 49.32 LONG W 125 41.36
DATE 22/ 9/80 PASS NO. 13
TIME (PST) 2147 STN: A.P. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.1	2.1	31.53	12.29	23.85	
5.1	5.1	31.54	12.34	23.84	
9.9	10.0	31.54	12.34	23.84	
14.9	15.0	31.65	12.10	23.97	
19.9	20.0	31.94	10.69	24.45	
25.0	25.1	32.08	10.01	24.67	3.85
29.9	30.0	32.13	9.86	24.74	
34.8	34.9	32.20	9.69	24.82	
39.9	40.1	32.33	9.47	24.95	
44.6	44.8	32.36	9.37	25.00	3.31
50.0	50.2	32.37	9.35	25.01	
50.0	50.2	32.37	9.35	25.01	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE                           TAPE: U00454   -389
LAT  N 48 53.19                                LONG W 125 36.12
DATE 22/ 9/80                                  PASS NO. 15
TIME (PST) 2231                                STN: A.P. 1

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
   2.4        2.4     31.54      11.87     23.93
   5.0        5.0     31.54      11.87     23.93
  10.0       10.0     31.53      11.92     23.91
  15.1       15.1     31.58      11.45     24.04
  20.0       20.1     31.90      10.63     24.43
  24.8       24.9     32.04      10.21     24.61
  29.9       30.0     32.14       9.97     24.73
  34.8       35.0     32.34       9.38     24.98
  39.8       40.0     32.43       9.22     25.07
  44.8       45.0     32.47       9.17     25.11
  49.8       50.1     32.50       9.10     25.15
  57.4       57.7     32.58       9.00     25.22

CRUISE NO:  14   CODE                          TAPE: U00454   -390
LAT  N 48 48.20                                LONG W 125 23.70
DATE 22/ 9/80                                  PASS NO. 17
TIME (PST) 2337                                STN: B.S. 1

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
   2.6        2.6     31.39      10.73     24.01
   5.0        5.0     31.39      10.73     24.01
  10.0       10.0     31.39      10.73     24.01
  14.9       15.0     31.44      10.68     24.06
  19.9       19.9     31.56      10.69     24.16
  25.0       25.1     31.83      10.44     24.40
  29.7       29.8     32.10      10.82     24.55
  34.8       35.0     32.48      11.29     24.77
  39.8       40.0     32.62      10.95     24.93
  44.9       45.1     32.66      10.76     25.00
  49.7       50.0     32.66      10.29     25.08
  59.6       59.9     32.81       9.95     25.25
  69.6       70.0     32.96       8.63     25.58
  80.5       80.9     33.10       8.43     25.72
  81.1       81.6     33.13       8.39     25.75
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                              TAPE: U00454    -391
LAT  N 48 44.40                                    LONG W 125 29.10
DATE 22/ 9/80                                      PASS NO. 19
TIME (PST) 2317                                    STN: B.S. 2

  DEPTH      PRESS       SAL        TEMP      SIGMA-T    OXYGEN
    3.4        3.4      32.37      11.79      24.59
    4.9        4.9      32.38      11.79      24.59
    9.9       10.0      32.38      11.78      24.60
   14.9       15.0      32.38      11.75      24.60
   19.9       20.0      32.38      11.70      24.61
   24.8       24.9      32.62      10.76      24.97     5.04
   29.8       29.9      32.72      10.34      25.11
   34.8       35.0      32.74      10.10      25.17
   39.7       39.9      32.84       9.61      25.33
   44.8       45.0      32.97       8.94      25.54
   49.7       50.0      33.04       8.72      25.63     3.36
   59.7       60.0      33.14       8.44      25.75
   69.6       70.0      33.28       8.20      25.89
   75.5       75.9      33.33       8.08      25.95     2.78
   80.4       80.8      33.42       7.90      26.05
   90.5       91.0      33.46       7.77      26.10
  100.5      101.1      33.51       7.66      26.16     2.51
  110.2      110.9      33.53       7.63      26.18     2.71
  120.2      121.0      33.56       7.57      26.21
  121.2      122.0      33.56       7.57      26.21
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                          TAPE: U00454    -392
LAT  N 48 40.40                                LONG W 125 34.50
DATE 23/ 9/80                                  PASS NO. 21
TIME (PST) 0010                                STN: B.S. 3

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
   3.2        3.2     32.35      12.35     24.47
   4.9        4.9     32.35      12.34     24.47
   9.9       10.0     32.39      12.35     24.50
  15.0       15.0     32.48      11.16     24.79
  20.0       20.1     32.65      10.30     25.07
  25.0       25.2     32.82       9.63     25.31
  29.9       30.1     32.97       9.00     25.53
  34.8       35.0     33.04       8.78     25.62
  39.7       39.9     33.14       8.47     25.75
  44.8       45.1     33.24       8.26     25.85
  49.7       50.0     33.28       8.17     25.90
  59.5       59.9     33.31       8.09     25.93
  69.4       69.9     33.39       7.86     26.03
  79.5       80.0     33.41       7.81     26.06
  90.5       91.1     33.46       7.72     26.11
 100.4      101.1     33.50       7.64     26.15
 110.4      111.1     33.58       7.50     26.23
 120.3      121.1     33.61       7.45     26.26
 130.2      131.1     33.63       7.42     26.28
 140.1      141.0     33.63       7.40     26.29
 150.0      151.0     33.64       7.39     26.29
 159.8      160.9     33.64       7.39     26.30
 169.9      171.1     33.64       7.39     26.30
 179.8      181.0     33.67       7.34     26.33
 188.8      190.1     33.71       7.26     26.37
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 36.40
DATE 23/ 9/80
TIME (PST) 0050

TAPE: U00454 -393
LONG W 125 40.10
PASS NO. 23
STN: B.S. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.1	3.1	32.30	12.04	24.49	
5.1	5.2	32.30	12.03	24.49	
10.3	10.4	32.30	12.05	24.48	
14.9	15.0	32.44	11.56	24.69	
20.0	20.1	32.90	9.08	25.46	
24.9	25.0	32.97	8.79	25.56	3.48
29.9	30.0	33.08	8.47	25.70	
34.9	35.1	33.14	8.36	25.76	
39.8	40.0	33.23	8.14	25.87	
44.8	45.0	33.24	8.11	25.88	
49.7	50.0	33.32	7.93	25.96	2.36
54.6	54.9	33.35	7.86	26.00	

CRUISE NO: 14 CODE
LAT N 48 32.20
DATE 23/ 9/80
TIME (PST) 0148

TAPE: U00454 -394
LONG W 125 45.70
PASS NO. 25
STN: B.S. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.4	4.4	32.32	11.31	24.64
5.0	5.0	32.34	11.29	24.66
9.9	10.0	32.88	9.44	25.39
15.0	15.1	32.94	9.05	25.50
19.8	19.9	33.11	8.40	25.73
25.0	25.2	33.15	8.29	25.78
29.8	30.0	33.28	8.01	25.92
35.0	35.3	33.30	7.95	25.95
39.8	40.1	33.31	7.93	25.96
44.5	44.8	33.32	7.92	25.97
49.8	50.1	33.33	7.91	25.98
59.7	60.0	33.43	7.76	26.08
70.4	70.8	33.49	7.68	26.13
79.6	80.1	33.49	7.67	26.14
89.5	90.1	33.61	7.49	26.26

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                         TAPE: U00454    -395
LAT   N 48 28.00                              LONG W 125 51.50
DATE 23/ 9/80                                 PASS NO. 27
TIME (PST) 0234                               STN: B.S. 6

 DEPTH      PRESS       SAL       TEMP    SIGMA-T    OXYGEN
   2.4        2.4      32.02      11.21     24.42
   4.9        5.0      32.18      10.88     24.60
   9.9       10.0      32.16      10.90     24.58
  14.8       14.9      32.47      10.36     24.92
  20.0       20.1      32.61       9.96     25.09
  24.8       24.9      32.76       9.39     25.31     3.56
  29.8       30.0      32.86       9.07     25.43
  34.8       34.9      32.97       8.70     25.58
  39.9       40.1      33.16       8.38     25.77
  44.9       45.2      33.22       8.28     25.84
  49.8       50.1      33.35       7.95     25.99     2.68
  59.6       60.0      33.47       7.73     26.12
  70.4       70.9      33.61       7.42     26.27
  74.6       75.1      33.66       7.33     26.32     2.05
  80.4       80.9      33.69       7.25     26.35
  90.4       91.0      33.74       7.12     26.42
 100.4      101.1      33.79       6.99     26.47     1.64
 110.1      110.9      33.81       6.93     26.49
 115.3      116.0      33.83       6.90     26.51     1.53
 120.1      120.9      33.85       6.84     26.54
 122.2      123.0      33.87       6.79     26.56
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE   TAPE: U00454   -396
LAT N 48 23.80   LONG W 125 57.40
DATE 23/ 9/80   PASS NO. 29
TIME (PST) 0325   STN: B.S. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	32.20	12.41	24.34
4.8	4.8	32.26	12.38	24.40
9.7	9.7	32.28	12.12	24.46
15.0	15.0	32.36	11.25	24.68
20.0	20.1	32.46	9.71	25.02
24.9	25.1	32.61	8.96	25.26
29.8	29.9	32.72	8.61	25.40
34.8	35.0	32.77	8.55	25.44
39.7	39.9	32.86	8.44	25.53
44.8	45.0	33.00	8.34	25.65
49.7	50.0	33.06	8.30	25.71
59.7	60.0	33.27	8.11	25.90
69.6	70.0	33.36	8.02	25.99
79.6	80.1	33.58	7.82	26.18
90.5	91.0	33.63	7.78	26.23
100.4	101.0	33.74	7.67	26.34
110.2	110.9	33.83	7.59	26.42
120.1	120.9	33.86	7.54	26.45
130.2	131.0	33.88	7.48	26.47
140.0	141.0	33.90	7.40	26.50
150.1	151.1	33.91	7.30	26.52
159.9	161.0	33.93	7.16	26.56
169.8	171.0	33.94	7.08	26.58
179.7	181.0	33.95	7.01	26.60
189.7	191.0	33.95	6.98	26.60
199.6	201.0	33.96	6.97	26.61
224.5	226.1	33.96	6.94	26.61
250.2	252.0	33.96	6.92	26.61
275.1	277.1	33.97	6.88	26.62
299.8	302.0	33.97	6.83	26.64
324.6	327.1	33.97	6.80	26.64
344.4	347.0	33.97	6.77	26.64

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 19.20
DATE 23/ 9/80
TIME (PST) 0420

TAPE: U00454 -397
LONG W 126 2.50
PASS NO. 31
STN: B.S. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.4	2.4	32.20	13.27	24.17	
5.3	5.3	32.21	13.24	24.19	
9.9	10.0	32.21	13.24	24.18	
14.9	15.0	32.21	13.23	24.19	
19.8	19.9	32.21	13.23	24.19	
24.9	25.0	32.54	10.32	24.98	6.28
29.7	29.8	32.60	9.53	25.16	
34.8	35.0	32.63	8.94	25.27	
39.7	39.9	32.66	8.65	25.34	
44.7	44.9	32.70	8.55	25.39	
49.7	50.0	32.82	8.39	25.51	5.53
59.7	60.0	33.10	8.10	25.77	
69.6	70.0	33.38	7.73	26.04	
74.7	75.1	33.52	7.75	26.15	4.27
80.5	81.0	33.62	7.82	26.22	
90.4	91.0	33.70	7.74	26.29	
100.5	101.1	33.77	7.63	26.36	3.11
110.2	110.9	33.83	7.66	26.41	
120.1	120.9	33.87	7.56	26.45	
125.1	125.9	33.87	7.53	26.46	2.86
130.1	131.0	33.89	7.48	26.48	
140.1	141.0	33.91	7.41	26.50	
150.0	151.0	33.94	7.29	26.54	2.54
159.9	160.9	33.94	7.23	26.55	
169.8	171.0	33.95	7.13	26.58	
179.8	181.0	33.95	7.09	26.58	
189.5	190.9	33.95	7.02	26.60	
199.7	201.1	33.97	6.92	26.62	2.34
225.5	227.1	33.98	6.75	26.65	
250.2	252.0	33.99	6.66	26.67	2.12
275.0	277.0	33.99	6.56	26.69	
299.8	302.0	34.00	6.52	26.69	1.99
324.6	327.0	34.00	6.43	26.71	
350.3	352.9	34.01	6.32	26.73	
375.2	378.1	34.01	6.22	26.74	
399.9	403.0	34.02	6.13	26.77	
424.6	427.9	34.03	6.03	26.78	
450.4	453.9	34.03	5.94	26.80	
465.3	469.0	34.04	5.87	26.81	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  14    CODE                                    TAPE: U00454   -398
LAT  N 48  8.50                                           LONG W 126    .00
DATE 23/ 9/80                                             PASS NO. 33
TIME (PST) 0635                                           STN: 111

 DEPTH      PRESS       SAL        TEMP      SIGMA-T    OXYGEN
   2.0        2.0      32.33      13.90      24.15
   5.1        5.1      32.33      13.90      24.15
  10.0       10.0      32.33      13.90      24.15
  15.0       15.0      32.33      13.89      24.15
  19.8       19.9      32.34      13.83      24.17
  24.9       25.1      32.45      13.48      24.33      6.84
  29.8       30.0      32.62      11.48      24.84
  34.9       35.1      32.61       9.74      25.14
  39.7       39.9      32.63       9.47      25.19
  44.7       44.9      32.65       9.15      25.26
  49.9       50.2      32.65       8.97      25.29      6.03
  59.8       60.1      32.77       8.38      25.47
  69.6       70.0      32.92       8.14      25.62
  74.6       75.0      33.02       8.06      25.71      5.42
  80.5       81.0      33.16       7.98      25.83
  90.4       90.9      33.41       7.68      26.08
 100.3      100.9      33.54       7.53      26.20      4.25
 110.4      111.1      33.59       7.48      26.25
 120.2      120.9      33.70       7.41      26.34
 125.3      126.1      33.73       7.41      26.37      3.81
 130.3      131.1      33.77       7.30      26.41
 140.1      141.0      33.83       7.30      26.46
 150.0      151.0      33.85       7.26      26.48      3.44
 160.0      161.0      33.87       7.22      26.50
 169.8      170.9      33.88       7.20      26.51
 179.9      181.1      33.91       7.11      26.54
 189.7      191.0      33.92       7.04      26.56
 199.6      201.0      33.94       6.95      26.59      3.16
 224.6      226.1      33.95       6.77      26.63
 250.3      252.1      33.98       6.68      26.66      2.21
 275.0      277.0      33.98       6.48      26.69
 299.8      302.0      33.97       6.11      26.73      2.47
 324.6      327.0      33.99       6.04      26.75
 350.5      353.1      34.01       5.99      26.77
 375.0      377.8      34.03       5.91      26.80
 400.0      403.1      34.03       5.78      26.82
 424.7      428.0      34.05       5.71      26.84
 450.5      454.0      34.05       5.64      26.85
 475.2      479.0      34.07       5.56      26.87
 500.1      504.1      34.08       5.42      26.90       .99
 504.8      508.9      34.08       5.39      26.90
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE
LAT N 48 10.60
DATE 23/ 9/80
TIME (PST) 0752

TAPE: U00454   -399
LONG W 125 56.20
PASS NO. 35
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.9	1.9	32.28	13.94	24.10
4.9	4.9	32.31	13.94	24.13
10.0	10.0	32.32	13.94	24.13
14.9	15.0	32.32	13.94	24.13
19.9	20.0	32.32	13.93	24.13
24.9	25.0	32.43	12.25	24.55
30.4	30.6	32.64	9.66	25.16
34.8	35.0	32.62	9.44	25.19
39.8	40.0	32.63	9.25	25.23
44.7	44.9	32.63	8.86	25.29
49.8	50.1	32.66	8.46	25.37
59.6	59.9	32.83	8.29	25.53
69.5	69.9	33.07	8.10	25.74
80.2	80.6	33.38	7.94	26.01
90.3	90.9	33.51	7.89	26.12
100.3	100.9	33.64	7.63	26.26
110.2	110.9	33.80	7.63	26.38
120.2	121.0	33.87	7.46	26.46
130.0	130.8	33.91	7.21	26.53
140.1	141.0	33.92	7.21	26.54
150.1	151.1	33.92	7.19	26.54
159.8	160.8	33.95	7.04	26.59
169.8	170.9	33.96	6.94	26.61
179.9	181.1	33.96	6.87	26.62
189.6	190.9	33.96	6.87	26.62
200.4	201.8	33.96	6.84	26.62
224.6	226.1	33.97	6.80	26.64
250.3	252.1	33.99	6.70	26.66
275.0	277.0	33.98	6.66	26.66
300.5	302.7	33.99	6.60	26.68
324.6	327.0	33.99	6.58	26.68
350.2	352.8	34.00	6.50	26.70
375.8	378.7	34.00	6.41	26.71
399.8	402.9	34.02	6.19	26.76
424.6	427.9	34.02	6.09	26.77
450.3	453.9	34.02	5.97	26.78
475.3	479.1	34.05	5.77	26.83
499.9	503.9	34.06	5.59	26.87
527.7	532.0	34.07	5.45	26.89

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  14   CODE                               TAPE: U00434   -400
LAT  N 48 12.90                                     LONG W 125 52.00
DATE 23/ 9/80                                       PASS NO. 37
TIME (PST) 0830                                     STN: 109

 DEPTH     PRESS       SAL        TEMP     SIGMA-T    OXYGEN
   2.0       2.0     32.27       13.75     24.13
   5.0       5.0     32.27       13.75     24.13
  10.1      10.1     32.27       13.75     24.14
  14.9      15.0     32.28       13.75     24.14
  20.0      20.1     32.31       13.62     24.19
  24.8      24.9     32.54       10.99     24.86      6.23
  29.8      29.9     32.61        9.76     25.13
  34.8      34.9     32.62        8.96     25.27
  39.8      40.0     32.64        8.57     25.34
  44.6      44.8     32.69        8.43     25.40
  49.7      50.0     32.72        8.38     25.43      5.34
  59.8      60.1     33.04        8.22     25.71
  69.8      70.2     33.23        7.99     25.89
  74.6      75.0     33.26        7.98     25.91      4.47
  80.5      80.9     33.42        7.91     26.05
  90.3      90.8     33.53        7.89     26.13
 100.2     100.8     33.56        7.57     26.20      4.12
 110.3     111.0     33.63        7.46     26.28
 120.2     121.0     33.68        7.44     26.32
 125.2     126.0     33.70        7.42     26.34      3.71
 130.1     131.0     33.73        7.42     26.36
 140.0     140.9     33.80        7.37     26.42
 150.0     150.9     33.83        7.30     26.45      2.80
 160.5     161.6     33.85        7.33     26.47
 169.8     170.9     33.88        7.39     26.48
 179.8     181.0     33.90        7.30     26.51
 189.8     191.1     33.92        7.20     26.54
 199.8     201.1     33.93        7.14     26.56      2.21
 224.6     226.1     33.97        6.92     26.62
 250.3     252.1     33.97        6.85     26.63      2.04
 275.1     277.0     33.98        6.74     26.65
 299.9     302.1     33.99        6.60     26.68      1.94
 325.4     327.8     33.98        6.53     26.68
 350.3     353.0     33.99        6.46     26.70
 375.1     377.9     34.01        6.35     26.73
 399.9     402.9     34.01        6.28     26.74
 424.7     428.0     34.02        6.11     26.76
 450.4     453.9     34.03        5.95     26.80
 475.3     479.1     34.06        5.67     26.85
 500.2     504.2     34.07        5.46     26.89      1.46
 500.2     504.2     34.07        5.46     26.89
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE   TAPE: U00454   -401
LAT N 48 15.10   LONG W 125 47.70
DATE 23/ 9/80   PASS NO. 39
TIME (PST) 0921   STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
1.9	1.9	32.24	13.60	24.14
4.9	5.0	32.24	13.59	24.14
10.0	10.0	32.25	13.58	24.15
14.8	14.9	32.25	13.58	24.15
19.7	19.8	32.39	12.50	24.47
24.9	25.0	32.61	9.54	25.16
29.9	30.1	32.60	9.19	25.21
34.8	35.0	32.63	8.72	25.31
39.7	39.9	32.66	8.54	25.36
44.7	45.0	32.77	8.47	25.46
49.7	50.0	32.82	8.47	25.49
59.7	60.0	32.90	8.42	25.57
69.7	70.1	33.32	7.81	25.98
79.6	80.1	33.41	7.70	26.07
89.5	90.1	33.57	7.83	26.18
100.4	101.0	33.67	7.80	26.26
110.5	111.2	33.72	7.69	26.32
120.2	121.0	33.75	7.59	26.35
129.3	130.1	33.77	7.57	26.37
139.4	140.3	33.90	7.33	26.50
150.1	151.0	33.92	7.29	26.53
159.9	160.9	33.93	7.19	26.55
169.7	170.9	33.93	7.13	26.56
179.8	181.0	33.95	7.07	26.58
189.7	191.0	33.94	7.05	26.58
200.5	201.9	33.96	6.99	26.61
223.3	224.9	33.96	6.95	26.61

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                            TAPE: U00454    -402
LAT  N 48 18.60                                  LONG W 125 41.20
DATE 23/ 9/80                                    PASS NO. 41
TIME (PST) 1004                                  STN: 107

 DEPTH      PRESS       SAL       TEMP    SIGMA-T    OXYGEN
   2.7        2.7     32.22      13.38     24.17
   5.0        5.1     32.22      13.37     24.17
   9.9        9.9     32.23      13.35     24.18     3.27
  15.1       15.1     32.24      13.27     24.21
  19.9       20.0     32.42      11.36     24.71
  24.9       25.1     32.54       9.91     25.05     5.71
  30.0       30.1     32.60       9.20     25.21
  34.8       35.0     32.73       8.64     25.40
  39.8       40.0     32.83       8.47     25.50
  44.6       44.9     32.96       8.36     25.62
  49.8       50.1     33.10       8.21     25.75     4.05
  59.6       59.9     33.35       7.94     25.99
  69.6       70.0     33.50       7.88     26.11
  75.5       76.0     33.61       7.87     26.20     3.70
  79.5       80.0     33.65       7.86     26.24
  90.4       90.9     33.77       7.68     26.36
 100.2      100.8     33.83       7.63     26.41     2.92
 110.2      110.9     33.87       7.55     26.45
 120.2      121.0     33.90       7.40     26.50
 125.1      125.9     33.91       7.34     26.51     2.40
 130.3      131.1     33.92       7.24     26.54
 139.0      139.9     33.92       7.23     26.54
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE TAPE: U00454 -403
LAT N 48 22.00 LONG W 125 34.70
DATE 23/ 9/80 PASS NO. 43
TIME (PST) 1058 STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	32.23	11.22	24.58
5.0	5.0	32.26	11.24	24.60
10.0	10.0	32.40	10.78	24.79
15.0	15.0	32.57	10.31	25.00
19.9	20.0	32.68	9.71	25.19
24.8	24.9	32.87	9.17	25.43
29.9	30.0	33.00	8.83	25.58
34.9	35.1	33.23	8.46	25.82
39.7	40.0	33.37	8.11	25.98
44.7	45.0	33.38	8.09	25.99
49.9	50.2	33.49	7.79	26.12
59.5	59.9	33.64	7.38	26.29
69.6	70.0	33.73	7.16	26.40
80.5	81.0	33.76	7.06	26.44
90.6	91.2	33.80	6.97	26.48
100.5	101.2	33.84	6.85	26.53
110.3	111.0	33.87	6.79	26.56
120.2	121.0	33.89	6.74	26.58
130.1	131.0	33.91	6.69	26.61
140.0	140.9	33.92	6.69	26.61
146.1	147.1	33.91	6.68	26.61

CRUISE NO: 14 CODE TAPE: U00454 -404
LAT N 48 25.50 LONG W 125 28.30
DATE 23/ 9/80 PASS NO. 45
TIME (PST) 1134 STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.3	2.3	32.19	12.19	24.38	
5.1	5.1	32.19	12.14	24.39	
10.0	10.0	32.27	12.02	24.47	6.78
14.9	15.0	32.51	11.57	24.74	
19.9	20.0	32.83	10.13	25.24	
25.0	25.1	33.09	8.89	25.64	3.32
29.6	29.7	33.30	8.26	25.91	
34.8	35.0	33.43	7.91	26.05	
39.4	39.6	33.46	7.81	26.09	
44.7	45.0	33.55	7.57	26.20	
49.7	50.0	33.58	7.47	26.24	2.11
59.6	60.0	33.67	7.27	26.33	
69.6	70.0	33.73	7.10	26.40	
75.3	75.8	33.78	6.96	26.46	1.56
79.6	80.1	33.80	6.92	26.49	
90.5	91.1	33.85	6.81	26.54	
100.4	101.1	33.89	6.73	26.58	1.26
110.1	110.9	33.90	6.72	26.59	
120.2	121.0	33.90	6.69	26.60	
125.0	125.9	33.91	6.68	26.60	1.11
130.1	131.0	33.91	6.68	26.61	
131.4	132.3	33.91	6.68	26.61	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                                 TAPE: U00454    -405
LAT   N 48 28.90                                      LONG W 125 21.80
DATE 23/ 9/80                                         PASS NO. 47
TIME (PST) 1232                                       STN: 104

  DEPTH       PRESS        SAL        TEMP     SIGMA-T
    3.0         3.0      32.42       12.05       24.58
    5.0         5.0      32.42       11.98       24.60
    9.9        10.0      32.52       11.55       24.75
   14.9        15.0      32.86       10.09       25.27
   19.9        20.0      32.95        9.39       25.46
   24.9        25.0      33.01        9.20       25.53
   29.7        29.8      33.09        8.94       25.64
   34.9        35.1      33.23        8.52       25.81
   39.8        40.0      33.31        8.25       25.91
   44.8        45.0      33.46        7.83       26.09
   49.7        50.0      33.47        7.79       26.10
   59.8        60.2      33.65        7.31       26.32
   69.7        70.1      33.79        6.95       26.47
   80.5        81.0      33.83        6.84       26.52
   90.2        90.8      33.86        6.78       26.55
  100.4       101.0      33.91        6.70       26.60
  110.2       111.0      33.92        6.68       26.61
  120.2       121.1      33.92        6.67       26.61
  130.1       131.0      33.92        6.67       26.61
  140.1       141.1      33.92        6.68       26.62
  149.9       151.0      33.92        6.68       26.61
  154.0       155.1      33.92        6.67       26.61

CRUISE NO:  14    CODE                                TAPE: U00454    -406
LAT   N 48 32.20                                      LONG W 125 15.50
DATE 23/ 9/80                                         PASS NO. 49
TIME (PST) 1312                                       STN: 103

  DEPTH       PRESS        SAL        TEMP     SIGMA-T    OXYGEN
    1.9         1.9      31.63       12.27       23.92
    5.0         5.0      32.45       12.34       24.55
   10.0        10.1      32.46       12.16       24.59     5.64
   14.9        15.0      32.73       10.52       25.09
   19.8        19.9      32.79       10.12       25.21
   25.0        25.1      33.03        8.97       25.58     3.86
   29.8        29.9      33.14        8.51       25.74
   34.8        35.0      33.33        8.11       25.94
   39.9        40.2      33.48        7.73       26.12
   44.6        44.9      33.57        7.50       26.22
   49.5        49.8      33.64        7.33       26.30     2.01
   59.6        60.0      33.75        7.08       26.43
   69.6        70.0      33.81        6.97       26.49
   74.6        75.0      33.83        6.94       26.51     1.60
   79.5        80.0      33.85        6.89       26.53
   90.4        91.0      33.90        6.82       26.58
  100.3       101.0      33.90        6.81       26.58     1.54
  110.3       111.0      33.90        6.81       26.58
  113.2       114.0      33.90        6.81       26.58
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 35.60
DATE 23/ 9/80
TIME (PST) 1403

TAPE: U00454 -407
LONG W 125 9.00
PASS NO. 51
STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.2	2.3	32.38	11.60	24.63
5.0	5.0	32.39	11.67	24.62
10.0	10.0	32.41	11.41	24.69
14.9	15.0	32.47	11.15	24.78
19.9	20.0	32.47	10.97	24.82
24.8	25.0	32.67	9.64	25.20
29.9	30.1	32.82	8.97	25.42
34.9	35.1	32.95	8.79	25.55
39.7	40.0	33.17	8.38	25.78
44.6	44.9	33.25	8.23	25.87
49.9	50.1	33.29	8.13	25.91
59.6	59.9	33.37	8.01	26.00
69.6	70.1	33.60	7.57	26.24
79.5	80.0	33.71	7.33	26.36
90.3	90.9	33.77	7.22	26.42
100.2	100.9	33.80	7.15	26.45
108.3	109.0	33.80	7.15	26.46

CRUISE NO: 14 CODE
LAT N 48 39.00
DATE 23/ 9/80
TIME (PST) 1440

TAPE: U00454 -408
LONG W 125 2.50
PASS NO. 53
STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.8	2.8	30.91	10.87	23.61	
4.7	4.8	30.94	10.84	23.64	
10.0	10.0	31.22	10.48	23.93	4.81
14.9	15.0	31.70	10.55	24.29	
19.9	19.9	31.93	10.78	24.42	
24.7	24.8	32.17	10.82	24.60	3.98
30.0	30.1	32.26	9.72	24.86	
34.9	35.0	32.49	9.74	25.04	
39.8	40.0	32.71	9.51	25.24	
44.8	45.1	32.81	9.30	25.36	
49.7	50.0	32.84	9.24	25.40	3.79
58.7	59.0	32.94	9.08	25.49	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE                                  TAPE: U00454   -409
LAT  N 48 34.35                                       LONG W 125    .05
DATE 23/ 9/80                                         PASS NO. 55
TIME (PST) 1520                                       STN: N.L. 7

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
   2.6        2.6     32.41      12.09     24.56
   5.0        5.0     32.39      11.90     24.58
  10.0       10.1     32.41      11.56     24.66
  15.0       15.1     32.53      11.22     24.82
  19.9       20.0     32.81      10.29     25.20
  24.9       25.0     32.80       9.95     25.24
  29.8       29.9     32.92       9.64     25.39
  35.0       35.1     32.94       9.58     25.42
  39.8       40.1     32.96       9.53     25.44
  44.8       45.1     33.18       8.68     25.75
  49.8       50.1     33.49       7.92     26.10
  56.7       57.0     33.65       7.46     26.30

CRUISE NO:  14    CODE                                TAPE: U00454   -410
LAT  N 48 28.11                                       LONG W 124 59.57
DATE 23/ 9/80                                         PASS NO. 57
TIME (PST) 1612                                       STN: N.L. 6

 DEPTH      PRESS       SAL       TEMP    SIGMA-T    OXYGEN
   2.0        2.0     31.83      11.64     24.19
   5.0        5.0     32.48      11.30     24.77
  10.0       10.0     32.45      11.09     24.78
  14.8       14.9     32.55      10.53     24.95
  20.0       20.1     32.69       9.73     25.19
  24.9       25.0     32.75       9.49     25.28     4.20
  29.7       29.9     32.85       9.33     25.39
  34.8       35.0     32.88       9.28     25.42
  39.9       40.1     33.03       8.83     25.60
  44.7       44.9     33.44       7.77     26.08
  49.6       49.9     33.49       7.67     26.13     2.52
  59.7       60.0     33.78       7.22     26.43
  69.6       70.1     33.80       7.18     26.45
  75.5       76.0     33.84       7.10     26.50     1.85
  80.3       80.8     33.84       7.05     26.50
  89.5       90.1     33.88       6.96     26.54     1.74
  95.1       95.7     33.88       6.96     26.54
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE                             TAPE: U00454   -411
LAT  N 48 25.36                                  LONG W 124 59.53
DATE 23/ 9/80                                    PASS NO. 59
TIME (PST) 1635                                  STN: N.L. 5

 DEPTH       PRESS       SAL       TEMP     SIGMA-T
   2.8         2.9      32.45     11.52      24.70
   4.8         4.9      32.48     11.48      24.73
  10.0        10.0      32.54     11.48      24.77
  14.9        15.0      32.51     11.45      24.76
  19.8        19.9      32.53     11.14      24.83
  24.8        24.9      32.52     11.08      24.83
  29.9        30.0      32.67     10.42      25.07
  34.9        35.1      33.26      8.41      25.85
  39.8        40.0      33.32      8.17      25.94
  44.6        44.9      33.32      8.16      25.93
  49.7        50.0      33.32      8.18      25.93
  59.6        60.0      33.58      7.61      26.22
  69.6        70.0      33.70      7.33      26.35
  80.4        80.9      33.78      7.15      26.44
  90.4        91.0      33.79      7.13      26.45
 100.5       101.1      33.85      7.02      26.51
 110.1       110.9      33.85      7.01      26.52
 120.2       121.0      33.85      7.00      26.51
 130.0       130.9      33.86      6.98      26.52
 140.1       141.1      33.86      6.98      26.53
 150.1       151.1      33.87      7.00      26.53
 159.7       160.8      33.87      7.01      26.53
 169.7       170.9      33.87      7.02      26.53
 179.6       180.9      33.88      7.02      26.53
 183.8       185.1      33.88      7.02      26.54
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 23.00
DATE 23/ 9/80
TIME (PST) 1704

TAPE: U00454 -412
LONG W 124 59.49
PASS NO. 61
STN: N.L. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.9	3.0	32.41	11.68	24.64	
4.9	4.9	32.44	11.67	24.67	
9.9	10.0	32.43	11.51	24.69	
14.9	15.0	32.53	10.84	24.88	
20.0	20.1	32.57	10.50	24.97	
24.8	25.0	32.65	10.18	25.09	4.13
29.8	30.0	32.83	9.59	25.33	
34.8	35.0	32.91	9.31	25.43	
39.8	40.0	33.28	8.28	25.88	
44.8	45.1	33.38	7.99	26.00	
49.7	50.0	33.41	7.88	26.04	2.53
59.7	60.0	33.67	7.37	26.32	
69.6	70.0	33.73	7.25	26.38	
74.6	75.0	33.79	7.12	26.45	1.92
80.4	80.9	33.82	7.08	26.48	
90.4	91.0	33.83	7.07	26.49	
100.4	101.1	33.84	7.06	26.50	1.79
110.3	111.0	33.85	7.02	26.51	
120.2	121.0	33.86	7.00	26.52	
125.3	126.1	33.87	6.97	26.54	1.77
130.2	131.0	33.87	6.97	26.54	
140.2	141.2	33.88	6.96	26.54	
150.0	151.1	33.88	6.97	26.54	1.70
159.9	161.0	33.88	6.97	26.54	
169.8	171.0	33.89	6.95	26.55	
179.6	180.9	33.88	6.94	26.55	
189.7	191.1	33.89	6.92	26.56	
199.7	201.1	33.89	6.93	26.56	1.65
224.9	226.6	33.89	6.94	26.55	
250.2	252.0	33.90	6.93	26.56	1.64
258.0	259.9	33.90	6.92	26.57	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 20.23
DATE 23/ 9/80
TIME (PST) 1746

TAPE: U00454 -413
LONG W 124 59.45
PASS NO. 63
STN: N.L. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.9	.9	32.46	10.87	24.82
2.0	2.0	32.45	10.92	24.81
5.1	5.1	32.49	10.72	24.88
9.9	10.0	32.56	10.47	24.97
15.0	15.1	32.58	10.39	25.00
19.9	20.0	32.73	9.61	25.25
24.8	24.9	32.94	8.83	25.53
29.9	30.1	33.05	8.59	25.66
34.9	35.1	33.18	8.40	25.79
39.9	40.1	33.18	8.37	25.79
44.7	45.0	33.29	8.21	25.90
49.8	50.1	33.48	7.84	26.10
59.6	60.0	33.59	7.51	26.24
69.5	69.9	33.69	7.30	26.35
79.5	80.0	33.72	7.23	26.38
90.4	91.0	33.76	7.14	26.43
100.3	101.0	33.84	6.98	26.51
110.1	110.9	33.86	6.97	26.52
120.2	121.0	33.86	6.96	26.53
130.1	131.0	33.86	6.94	26.53
140.1	141.0	33.89	6.97	26.55
149.9	150.9	33.88	6.99	26.54
159.9	161.0	33.89	6.99	26.55
169.9	171.1	33.90	6.98	26.56
179.6	180.8	33.90	6.98	26.56
189.7	191.1	33.91	6.97	26.56
199.7	201.1	33.91	6.97	26.57
219.1	220.7	33.91	6.95	26.57

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 17.45
DATE 23/ 9/80
TIME (PST) 1820

TAPE: U00654 -414
LONG W 124 59.40
PASS NO. 65
STN: N.L. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.7	2.7	32.53	11.62	24.75	
4.6	4.6	32.79	11.21	25.02	
10.0	10.1	32.75	11.09	25.01	
14.9	15.0	32.69	10.58	25.05	
19.9	20.0	32.70	9.92	25.17	
24.9	25.0	33.02	8.66	25.62	3.34
29.8	29.9	33.11	8.32	25.75	
34.7	34.9	33.17	8.26	25.80	
39.9	40.2	33.23	8.18	25.86	
44.6	44.9	33.31	8.11	25.93	
49.8	50.1	33.43	8.02	26.04	3.90
59.8	60.2	33.56	7.71	26.19	
70.5	70.9	33.66	7.40	26.31	
74.5	75.0	33.69	7.35	26.34	2.57
80.5	81.0	33.70	7.30	26.36	
90.3	90.9	33.78	7.12	26.44	
100.2	100.9	33.86	6.96	26.53	2.06
110.3	111.0	33.86	6.94	26.53	
120.2	121.0	33.86	6.94	26.53	
125.1	125.9	33.86	6.94	26.53	1.64
130.2	131.0	33.87	6.94	26.54	
140.1	141.1	33.87	6.92	26.54	
149.8	150.9	33.87	6.92	26.54	1.66
159.8	160.9	33.87	6.93	26.54	
169.7	170.9	33.87	6.93	26.54	
179.7	181.0	33.88	6.93	26.55	
189.6	191.0	33.87	6.92	26.54	
200.4	201.8	33.88	6.92	26.55	1.64
225.4	227.1	33.89	6.90	26.56	
250.2	252.0	33.93	6.94	26.59	1.78
265.0	267.0	33.93	6.92	26.59	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                                    TAPE: U00454    -415
LAT  N 48 15.06                                          LONG W 124 59.35
DATE 23/ 9/80                                            PASS NO. 67
TIME (PST) 1900                                          STN: N.L. 1

 DEPTH     PRESS      SAL       TEMP    SIGMA-T
   2.1       2.1     32.41     11.54     24.66
   5.1       5.1     32.39     11.53     24.65
  10.1      10.2     32.48     11.03     24.81
  14.9      15.0     32.58     10.32     25.01
  19.9      20.0     32.67      9.42     25.23
  25.0      25.1     32.93      8.72     25.54
  29.6      29.8     33.16      8.36     25.77
  34.8      35.0     33.18      8.24     25.81
  39.7      40.0     33.21      8.21     25.84
  44.7      44.9     33.37      8.01     26.00
  49.7      50.0     33.42      7.94     26.04
  59.7      60.1     33.60      7.75     26.21
  69.6      70.0     33.72      7.63     26.33
  79.7      80.3     33.78      7.55     26.38
  90.4      91.0     33.84      7.51     26.43
 100.4     101.0     33.85      7.35     26.47
 110.3     111.1     33.86      7.30     26.48
 120.2     121.0     33.86      7.22     26.49
 130.1     131.0     33.90      7.20     26.52
 139.9     140.9     33.92      7.11     26.56
 139.9     140.9     33.92      7.11     26.56
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CRUISE NO:  14    CODE                                   TAPE: U00454    -416
LAT  N 48 13.21                                          LONG W 124 56.37
DATE 23/ 9/80                                            PASS NO. 69
TIME (PST) 1924                                          STN: C.A.11

 DEPTH     PRESS      SAL       TEMP    SIGMA-T
   2.5       2.5     32.31     11.67     24.56
   5.0       5.0     32.34     11.48     24.62
  10.0      10.1     32.32     11.58     24.59
  15.0      15.1     32.57      9.88     25.08
  19.8      19.9     32.69      9.03     25.31
  24.8      24.9     32.89      8.44     25.56
  29.9      30.1     32.96      8.38     25.62
  34.8      35.0     33.09      8.28     25.74
  39.9      40.1     33.18      8.18     25.82
  45.3      45.6     33.29      7.95     25.94
  49.5      49.8     33.36      7.88     26.00
  59.7      60.1     33.70      7.67     26.30
  70.1      70.6     33.76      7.59     26.36
  80.5      81.0     33.77      7.56     26.37
  90.5      91.1     33.77      7.55     26.38
 100.4     101.1     33.78      7.54     26.38
 110.2     111.0     33.79      7.53     26.39
 120.1     120.9     33.80      7.49     26.41
 130.2     131.1     33.81      7.48     26.41
 135.0     135.9     33.81      7.46     26.42
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE TAPE: U00454 -417
LAT N 48 12.51 LONG W 125 2.25
DATE 23/ 9/80 PASS NO. 71
TIME (PST) 1955 STN: C.A.10

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.3	2.3	32.50	11.70	24.71	
4.9	4.9	32.50	11.70	24.71	
9.8	9.9	32.51	11.68	24.72	
14.9	14.9	32.71	10.26	25.12	
19.9	20.0	32.82	9.66	25.31	
24.8	24.9	33.02	8.71	25.62	3.10
29.9	30.1	33.17	8.51	25.76	
35.0	35.2	33.25	8.28	25.86	
39.6	39.9	33.37	8.04	25.99	
44.7	44.9	33.42	8.00	26.03	
49.6	49.9	33.44	8.01	26.05	3.70
59.6	60.0	33.56	7.63	26.20	
69.6	70.1	33.63	7.43	26.28	
74.6	75.1	33.65	7.40	26.30	2.30
79.6	80.1	33.69	7.34	26.34	
90.5	91.1	33.77	7.22	26.42	
100.2	100.9	33.80	7.22	26.44	2.08
110.1	110.8	33.81	7.20	26.46	
120.3	121.1	33.84	7.16	26.48	
125.2	126.0	33.85	7.15	26.49	1.94
130.0	130.9	33.86	7.13	26.50	
140.1	141.1	33.88	7.11	26.52	
150.0	151.0	33.89	7.10	26.53	1.92
159.8	160.9	33.89	7.09	26.53	
169.8	171.0	33.89	7.08	26.54	
179.6	180.9	33.89	7.05	26.54	
189.7	191.0	33.91	7.02	26.56	
199.7	201.2	33.92	7.01	26.57	1.85
216.2	217.8	33.93	6.96	26.58	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE   TAPE: U00454   -418
LAT N 48 12.24   LONG W 125 8.11
DATE 23/ 9/80   PASS NO. 73
TIME (PST) 2039   STN: C.A. 9

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.8	2.8	32.47	11.32	24.75
4.9	4.9	32.51	11.23	24.80
10.0	10.1	32.64	9.90	25.13
15.0	15.0	32.68	8.78	25.33
20.0	20.1	32.80	8.49	25.48
24.9	25.1	32.99	8.35	25.64
29.8	30.0	33.19	8.14	25.84
34.8	35.0	33.26	8.09	25.90
39.9	40.1	33.32	8.10	25.95
44.8	45.1	33.40	8.06	26.01
49.7	50.1	33.46	8.00	26.07
59.6	60.0	33.54	7.81	26.16
69.5	70.0	33.60	7.47	26.25
79.6	80.1	33.75	7.34	26.39
90.4	91.0	33.82	7.14	26.48
100.1	100.7	33.85	7.08	26.51
100.1	100.7	33.85	7.08	26.51

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 12.41
DATE 23/ 9/80
TIME (PST) 2105

TAPE: U00454 -419
LONG W 125 13.55
PASS NO. 75
STN: C.A. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.9	3.9	32.34	11.66	24.59	
4.9	4.9	32.38	11.67	24.62	
10.0	10.0	32.47	11.76	24.67	
14.9	15.0	32.75	9.30	25.31	
19.9	20.1	32.89	8.62	25.52	
24.9	25.1	32.94	8.46	25.59	3.98
29.8	30.0	33.12	8.26	25.76	
34.8	35.0	33.20	8.21	25.83	
39.7	39.9	33.25	8.16	25.88	
44.6	44.9	33.29	8.12	25.92	
49.8	50.1	33.33	8.08	25.95	3.50
60.5	60.9	33.48	7.99	26.09	
69.5	69.9	33.58	7.84	26.19	
75.5	76.0	33.66	7.73	26.26	3.15
80.5	81.0	33.69	7.70	26.29	
89.7	90.3	33.76	7.50	26.38	
100.2	100.9	33.79	7.32	26.42	2.49
110.2	110.9	33.80	7.33	26.43	
120.1	120.9	33.83	7.17	26.47	
125.1	126.0	33.84	7.15	26.49	2.07
130.1	131.0	33.85	7.12	26.50	
140.0	141.0	33.87	7.04	26.52	
149.7	150.8	33.87	7.01	26.53	1.74
159.8	160.9	33.88	6.96	26.54	
169.9	171.1	33.90	6.90	26.57	
179.7	181.0	33.89	6.89	26.56	
189.6	191.0	33.90	6.87	26.57	
199.7	201.1	33.90	6.86	26.57	1.62
220.4	221.9	33.91	6.85	26.59	1.64
223.4	225.0	33.91	6.85	26.58	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE                         TAPE: U00454   -420
LAT  N 48 11.37                              LONG W 125 19.38
DATE 23/ 9/80                                PASS NO. 77
TIME (PST) 2156                              STN: C.A. 7

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
   2.6        2.6     32.23      12.92     24.26
   4.9        5.0     32.23      12.92     24.27
  10.0       10.0     32.23      12.92     24.27
  14.8       14.9     32.23      12.90     24.27
  19.9       20.0     32.34      11.77     24.57
  25.0       25.1     32.51      10.12     24.99
  29.8       30.0     32.53       9.78     25.06
  34.9       35.1     32.55       9.61     25.11
  40.3       40.5     32.62       9.08     25.25
  44.7       45.0     32.73       8.66     25.40
  49.7       50.0     32.82       8.45     25.50
  59.9       60.2     33.06       8.28     25.71
  69.8       70.2     33.14       8.24     25.78
  79.5       80.0     33.31       8.09     25.93
  89.5       90.1     33.60       7.87     26.20
  98.3       98.9     33.71       7.81     26.29
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COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 14 CODE
TAPE: U00454 -421
LAT N 48 11.16
LONG W 125 25.19
DATE 23/ 9/80
PASS NO. 79
TIME (PST) 2225
STN: C.A. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
1.9	1.9	31.60	13.59	23.64	
5.0	5.0	32.22	13.59	24.13	
10.0	10.0	32.23	13.59	24.13	
15.0	15.1	32.22	13.59	24.13	
19.9	20.0	32.31	12.98	24.32	
24.9	25.0	32.50	10.98	24.84	6.16
29.8	30.0	32.57	9.68	25.11	
34.9	35.1	32.61	9.14	25.23	
39.9	40.1	32.64	8.92	25.28	
44.6	44.8	32.70	8.64	25.38	
49.8	50.0	32.74	8.56	25.42	4.91
59.7	60.0	32.92	8.40	25.58	
69.6	70.0	33.16	8.07	25.82	
74.6	75.0	33.34	7.91	25.99	4.04
79.5	79.9	33.50	7.86	26.12	
90.5	91.0	33.65	7.87	26.23	
100.4	101.0	33.76	7.78	26.34	2.96
110.3	111.0	33.87	7.55	26.45	
112.4	113.1	33.88	7.49	26.47	

CRUISE NO: 14 CODE
TAPE: U00454 -422
LAT N 48 10.57
LONG W 125 30.58
DATE 23/ 9/80
PASS NO. 81
TIME (PST) 2304
STN: C.A. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.2	3.2	32.23	13.41	24.17
5.1	5.1	32.23	13.42	24.17
10.0	10.1	32.23	13.40	24.17
15.0	15.0	32.30	12.73	24.36
19.9	20.0	32.52	10.55	24.92
24.8	25.0	32.54	9.45	25.12
30.0	30.1	32.62	8.86	25.28
34.9	35.0	32.65	8.66	25.33
39.9	40.1	32.70	8.48	25.40
44.8	45.0	32.79	8.36	25.48
49.6	49.9	32.84	8.31	25.53
59.7	60.0	33.04	8.10	25.73
70.2	70.6	33.25	7.90	25.91
79.6	80.1	33.41	7.86	26.05
90.4	91.0	33.61	7.88	26.20
100.1	100.7	33.74	7.77	26.32
110.2	110.9	33.84	7.59	26.42
119.3	120.1	33.88	7.47	26.47
129.3	130.2	33.90	7.36	26.50
140.0	140.9	33.91	7.33	26.51
143.1	144.0	33.91	7.33	26.51

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14   CODE                               TAPE: U00454   -423
LAT  N 48 10.40                                    LONG W 125 36.35
DATE 23/ 9/80                                      PASS NO. 83
TIME (PST) 2339                                    STN: C.A. 4

 DEPTH      PRESS       SAL       TEMP    SIGMA-T   OXYGEN
   2.4        2.4     32.22      13.41     24.17
   4.9        4.9     32.23      13.40     24.17
  10.0       10.1     32.23      13.38     24.17
  15.0       15.1     32.23      13.29     24.19
  19.9       20.0     32.39      11.86     24.59
  24.9       25.0     32.60       9.67     25.13     6.06
  29.9       30.0     32.61       9.19     25.22
  34.8       35.0     32.65       8.67     25.33
  39.7       40.0     32.68       8.54     25.37
  44.7       44.9     32.82       8.45     25.49
  49.7       50.0     32.87       8.38     25.55     5.26
  59.7       60.0     33.10       8.07     25.78
  69.6       70.0     33.28       7.98     25.92
  74.6       75.0     33.34       8.00     25.98     3.63
  79.6       80.1     33.48       7.94     26.09
  90.5       91.0     33.65       7.87     26.23
 100.4      101.0     33.73       7.79     26.31     3.05
 110.2      110.9     33.78       7.70     26.36
 120.2      121.0     33.84       7.55     26.43
 125.2      126.0     33.84       7.54     26.43     2.40
 130.1      131.0     33.86       7.46     26.46
 140.1      141.0     33.91       7.27     26.53
 150.1      151.1     33.92       7.25     26.53
 157.8      158.8     33.92       7.24     26.53
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 10.26
DATE 24/ 9/80
TIME (PST) 0022

TAPE: U00454 -424
LONG W 125 42.11
PASS NO. 05
STN: C.A. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	32.25	13.66	24.13
5.0	5.0	32.25	13.66	24.14
10.0	10.0	32.25	13.64	24.14
15.0	15.0	32.26	13.54	24.17
19.9	20.0	32.33	12.78	24.37
24.9	25.0	32.52	10.27	24.98
29.8	29.9	32.57	9.42	25.15
34.8	35.0	32.60	9.18	25.21
39.8	40.1	32.59	8.99	25.24
44.8	45.0	32.61	8.68	25.30
49.8	50.0	32.68	8.49	25.38
59.7	60.0	32.99	8.38	25.64
69.6	70.0	33.23	7.96	25.89
79.6	80.0	33.38	7.75	26.04
90.4	91.0	33.48	7.67	26.13
100.4	101.0	33.64	7.76	26.24
110.3	111.0	33.72	7.71	26.32
120.1	120.8	33.82	7.63	26.41
130.1	130.9	33.85	7.58	26.43
140.1	141.0	33.89	7.42	26.49
150.0	150.9	33.89	7.38	26.50
160.1	161.1	33.90	7.35	26.51
169.9	171.0	33.91	7.28	26.53
179.7	180.9	33.92	7.24	26.53
189.7	191.0	33.93	7.22	26.54
199.6	201.0	33.93	7.14	26.56
225.5	227.1	33.94	7.10	26.57
250.2	252.0	33.94	7.06	26.58
274.9	276.9	33.95	7.03	26.59
299.8	302.0	33.96	6.87	26.62
325.5	327.9	33.99	6.58	26.68
348.2	350.8	34.00	6.45	26.70

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE TAPE: U00454 -425
LAT N 48 10.13 LONG W 125 47.46
DATE 24/ 9/80 PASS NO. 87
TIME (PST) 0057 STN: C.A. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.2	2.2	32.30	13.91	24.12	
4.9	4.9	32.30	13.90	24.13	
9.9	10.0	32.30	13.90	24.13	
15.0	15.0	32.30	13.91	24.13	
19.9	20.0	32.47	12.25	24.58	
24.8	25.0	32.57	10.29	25.01	6.36
29.8	30.0	32.61	9.54	25.16	
34.7	34.9	32.63	9.12	25.24	
39.8	40.0	32.63	8.98	25.27	
44.8	45.0	32.64	8.69	25.32	
49.6	49.9	32.64	8.62	25.33	5.95
59.7	60.0	32.72	8.42	25.43	
69.5	69.9	33.04	8.24	25.70	
74.6	75.0	33.10	8.14	25.76	4.60
79.5	80.0	33.24	7.95	25.90	
89.6	90.1	33.48	7.94	26.09	
99.6	100.2	33.57	7.88	26.17	3.74
110.3	111.0	33.64	7.72	26.25	
120.3	121.1	33.76	7.72	26.34	
125.3	126.0	33.79	7.72	26.37	2.92
130.2	131.0	33.81	7.68	26.39	
140.0	140.9	33.83	7.66	26.41	
150.0	151.0	33.87	7.52	26.46	2.61
160.0	161.0	33.89	7.44	26.48	
169.9	171.0	33.91	7.36	26.51	
179.9	181.1	33.91	7.26	26.53	
189.8	191.1	33.91	7.18	26.54	
199.7	201.0	33.92	7.15	26.55	2.64
224.6	226.1	33.96	6.97	26.61	
250.3	252.0	33.97	6.86	26.63	2.10
275.0	277.0	33.98	6.66	26.67	
299.8	302.0	33.99	6.48	26.70	1.84
324.6	327.0	34.00	6.40	26.71	
350.5	353.1	34.01	6.33	26.73	
375.1	378.0	34.01	6.24	26.74	
399.9	403.0	34.02	6.09	26.77	
424.6	427.9	34.03	5.98	26.79	
449.5	453.1	34.05	5.75	26.83	
475.0	478.8	34.07	5.52	26.88	
499.8	503.8	34.09	5.24	26.93	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  14   CODE                             TAPE: U00454   -426
LAT  N 48 10.02                                   LONG W 125 53.18
DATE 24/ 9/80                                     PASS NO. 89
TIME (PST) 0216                                   STN: C.A. 1

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
    .9         .9     32.32      13.92     24.14
   2.1        2.1     32.33      13.97     24.14
   4.9        4.9     32.32      13.97     24.13
  10.0       10.0     32.32      13.97     24.13
  14.9       15.0     32.32      13.97     24.13
  19.9       20.0     32.36      13.61     24.23
  24.9       25.0     32.56      11.27     24.83
  29.9       30.1     32.66       9.73     25.17
  35.0       35.2     32.62       9.20     25.23
  39.8       40.0     32.62       9.01     25.26
  44.7       45.0     32.62       8.84     25.28
  49.7       50.0     32.62       8.66     25.31
  59.5       59.9     32.78       8.36     25.48
  69.7       70.1     33.07       8.12     25.74
  79.5       80.0     33.37       7.96     26.00
  89.5       90.0     33.58       7.89     26.18
 100.5      101.1     33.75       7.68     26.34
 110.1      110.8     33.80       7.64     26.39
 120.2      120.9     33.84       7.57     26.43
 130.1      131.0     33.86       7.53     26.45
 140.0      140.9     33.88       7.44     26.48
 149.9      150.9     33.90       7.32     26.51
 159.8      160.9     33.92       7.22     26.54
 169.9      171.1     33.92       7.18     26.54
 179.8      181.0     33.95       7.01     26.60
 189.7      191.0     33.96       6.99     26.60
 199.7      201.1     33.96       6.99     26.60
 225.4      227.0     33.96       6.90     26.62
 250.3      252.1     33.98       6.79     26.64
 275.1      277.1     33.98       6.72     26.66
 299.7      301.9     33.99       6.67     26.67
 324.5      326.9     33.99       6.61     26.68
 350.3      352.9     33.99       6.46     26.70
 375.1      378.0     34.01       6.26     26.74
 400.0      403.1     34.01       6.19     26.75
 424.7      428.0     34.02       6.10     26.77
 449.5      453.1     34.04       5.85     26.81
 475.2      479.0     34.05       5.66     26.85
 500.0      504.0     34.07       5.48     26.88
 504.7      508.8     34.07       5.46     26.89
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE
LAT N 48 15.03
DATE 24/ 9/80
TIME (PST) 0339

TAPE: U00454 -427
LONG W 125 36.21
PASS NO. 1
STN: X. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.5	2.5	32.23	13.47	24.16	
5.0	5.0	32.24	13.42	24.17	
9.9	10.0	32.23	13.29	24.20	
15.0	15.1	32.44	11.02	24.78	
20.1	20.2	32.51	10.28	24.96	
24.9	25.0	32.59	9.16	25.21	6.06
29.9	30.1	32.64	8.69	25.32	
34.8	35.0	32.70	8.54	25.39	
39.9	40.1	32.80	8.46	25.48	
44.7	45.0	32.87	8.39	25.55	
49.8	50.0	32.98	8.32	25.65	4.20
59.7	60.0	33.23	8.03	25.88	
69.5	70.0	33.47	7.77	26.10	
74.7	75.1	33.57	7.76	26.18	3.62
79.6	80.0	33.59	7.75	26.21	
89.5	90.0	33.65	7.77	26.25	
100.3	101.0	33.80	7.68	26.38	2.78
110.3	111.1	33.87	7.48	26.47	
120.1	120.9	33.90	7.36	26.50	
125.2	126.0	33.90	7.35	26.50	2.15
130.2	131.0	33.91	7.29	26.52	
139.0	139.9	33.91	7.27	26.53	

CRUISE NO: 14 CODE
LAT N 48 16.42
DATE 24/ 9/80
TIME (PST) 0416

TAPE: U00454 -428
LONG W 125 30.43
PASS NO. 3
STN: X. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.4	2.4	32.22	13.01	24.24
4.8	4.8	32.22	12.99	24.25
9.9	9.9	32.22	13.00	24.25
14.9	15.0	32.57	10.94	24.89
19.9	20.0	32.60	9.63	25.14
25.1	25.2	32.70	8.79	25.35
29.7	29.9	32.91	8.49	25.56
34.7	34.9	32.97	8.38	25.62
39.8	40.1	33.06	8.24	25.72
44.8	45.1	33.18	8.21	25.81
49.7	50.0	33.26	8.16	25.89
59.8	60.1	33.43	7.97	26.05
69.6	70.0	33.64	7.84	26.23
80.5	81.0	33.73	7.78	26.31
89.5	90.1	33.80	7.64	26.38
100.4	101.1	33.87	7.56	26.46
110.3	111.0	33.92	7.29	26.53
120.1	120.9	33.92	7.26	26.53
128.9	129.8	33.92	7.26	26.53

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14 CODE TAPE: U00454 -429
LAT N 48 18.20 LONG W 125 25.06
DATE 24/ 9/80 PASS NO. 5
TIME (PST) 0452 STN: X. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.5	2.5	32.07	11.87	24.34	
4.8	4.9	32.07	11.88	24.34	
10.0	10.0	32.07	11.58	24.39	
14.9	15.0	32.21	11.04	24.60	
19.9	20.0	32.42	10.36	24.88	
24.8	24.9	32.81	9.32	25.35	3.89
29.9	30.1	33.08	8.59	25.68	
34.9	35.1	33.17	8.39	25.78	
39.8	40.0	33.27	8.19	25.89	
44.7	45.0	33.42	7.93	26.04	
49.6	49.9	33.49	7.73	26.13	2.57
59.6	60.0	33.60	7.46	26.26	
69.6	70.1	33.73	7.13	26.40	
74.5	75.0	33.77	7.10	26.44	1.92
79.6	80.1	33.85	7.22	26.48	
90.4	91.0	33.91	7.05	26.55	
100.4	101.1	33.92	7.03	26.57	1.72
110.3	111.1	33.92	7.03	26.56	
120.2	121.0	33.91	7.04	26.56	
127.0	127.9	33.91	7.04	26.56	

CRUISE NO: 14 CODE TAPE: U00454 -430
LAT N 48 19.58 LONG W 125 19.30
DATE 24/ 9/80 PASS NO. 7
TIME (PST) 0531 STN: X. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.2	2.2	32.24	11.58	24.53
5.1	5.2	32.24	11.55	24.53
9.9	10.0	32.20	11.64	24.49
14.9	15.0	32.57	10.76	24.93
19.9	20.1	32.61	10.45	25.01
24.9	25.0	32.66	10.00	25.13
29.8	29.9	32.93	9.26	25.46
34.7	34.9	33.09	8.80	25.65
39.8	40.1	33.27	8.43	25.85
44.7	45.0	33.33	8.24	25.93
49.7	50.0	33.42	7.96	26.04
59.6	60.0	33.62	7.43	26.27
69.6	70.0	33.75	7.11	26.42
80.5	81.0	33.79	6.99	26.47
90.4	91.0	33.84	6.85	26.53
100.3	101.0	33.92	6.81	26.60
110.2	110.9	33.92	6.80	26.60
112.3	113.0	33.92	6.80	26.59

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 14    CODE                          TAPE: U00454   -431
LAT  N 48 21.35                                LONG W 125 13.53
DATE 24/ 9/80                                  PASS NO.  9
TIME (PST) 0605                                STN: X. 5

  DEPTH      PRESS       SAL       TEMP    SIGMA-T   OXYGEN
    2.8        2.9     32.24      11.96     24.46
    4.8        4.9     32.23      11.96     24.45
   10.0       10.1     32.32      11.87     24.54
   14.9       15.0     32.56      11.27     24.83
   19.8       19.9     32.92       9.68     25.38
   24.9       25.0     33.15       8.72     25.71     3.08
   29.9       30.0     33.36       8.05     25.98
   35.4       35.6     33.42       7.87     26.06
   39.7       40.0     33.54       7.60     26.19
   44.8       45.0     33.56       7.55     26.21
   49.5       49.8     33.63       7.41     26.28     2.08
   59.6       60.0     33.76       7.17     26.42
   69.6       70.0     33.77       7.17     26.43
   75.5       76.0     33.80       7.08     26.46     1.71
   80.4       80.9     33.81       6.99     26.49
   90.4       91.0     33.84       6.97     26.51
  100.3      100.9     33.88       6.89     26.55     1.52
  110.3      111.0     33.89       6.88     26.57
  120.1      120.9     33.91       6.88     26.58
  125.1      126.0     33.91       6.89     26.58     1.50
  130.0      130.9     33.91       6.87     26.58
  140.2      141.1     33.90       6.77     26.59
  149.9      151.0     33.91       6.71     26.60     1.18
  159.7      160.8     33.92       6.69     26.61
  169.8      171.0     33.92       6.69     26.61

CRUISE NO:  14    CODE                         TAPE: U00454   -432
LAT  N 48 23.12                                LONG W 125   8.17
DATE 24/ 9/80                                  PASS NO. 11
TIME (PST) 0754                                STN: X. 6

  DEPTH      PRESS       SAL       TEMP    SIGMA-T
    2.5        2.5     32.53      11.36     24.79
    5.0        5.0     32.57      11.33     24.83
    9.9        9.9     32.69      10.70     25.03
   14.9       15.0     32.86       9.85     25.31
   19.8       19.9     32.89       9.67     25.36
   24.6       24.8     32.93       9.51     25.42
   29.8       30.0     33.10       8.86     25.65
   34.6       34.8     33.41       7.87     26.05
   39.7       40.0     33.56       7.54     26.21
   44.9       45.2     33.60       7.45     26.25
   49.8       50.1     33.71       7.21     26.37
   59.7       60.0     33.82       7.08     26.48
   69.6       70.0     33.86       6.94     26.53
   80.5       81.0     33.88       6.86     26.56
   90.4       91.0     33.90       6.82     26.58
   99.4      100.1     33.90       6.81     26.58
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15    CODE                          TAPE: U00454   -433
LAT  N 48 39.00                                LONG W 125  2.50
DATE 22/10/80                                  PASS NO.  3
TIME (PST) 1857                                STN: 101

 DEPTH     PRESS      SAL       TEMP    SIGMA-T   OXYGEN
   2.8       2.8     31.68      9.92     24.38
   4.9       4.9     31.68      9.92     24.38
  10.0      10.1     31.68      9.92     24.37    4.68
  15.0      15.1     31.68      9.92     24.38
  19.9      20.0     31.68      9.88     24.38
  24.9      25.0     31.68      9.85     24.39    4.67
  29.8      29.9     31.68      9.82     24.39    3.65
  34.8      34.9     31.68      9.82     24.39
  39.8      40.0     31.76      9.62     24.49
  44.8      45.0     31.86      9.55     24.58
  49.7      50.0     32.24      9.26     24.92
  53.4      53.7     32.26      9.24     24.94

CRUISE NO:  15   CODE                          TAPE: U00454   -434
LAT  N 48 35.60                                LONG W 125  9.00
DATE 22/10/80                                  PASS NO.  5
TIME (PST) 1947                                STN: 102

 DEPTH     PRESS      SAL       TEMP    SIGMA-T
   2.8       2.8     32.16     11.59     24.46
   5.0       5.0     32.17     11.59     24.47
  10.0      10.1     32.17     11.58     24.47
  15.0      15.1     32.15     11.58     24.46
  19.9      20.0     32.24     11.40     24.56
  24.9      25.1     32.07     10.52     24.58
  30.0      30.2     32.15      9.78     24.76
  34.8      35.0     32.40      9.18     25.06
  39.8      40.0     32.45      9.16     25.10
  44.8      45.0     32.54      9.19     25.17
  49.7      49.9     32.83      9.09     25.41
  59.7      60.0     33.14      8.44     25.75
  69.7      70.1     33.25      8.23     25.87
  79.5      80.0     33.41      7.95     26.03
  90.4      90.9     33.55      7.71     26.18
 100.5     101.1     33.70      7.47     26.33
 103.3     104.0     33.70      7.46     26.33
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COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 15 CODE	TAPE: U00454 -435
LAT N 48 32.20	LONG W 125 15.50
DATE 22/10/80	PASS NO. 7
TIME (PST) 2030	STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.8	2.8	32.53	11.18	24.83	
4.9	4.9	32.53	11.17	24.82	
10.1	10.1	32.54	11.15	24.84	6.08
15.0	15.1	32.54	11.12	24.84	
19.9	20.0	32.56	11.12	24.85	
24.9	25.0	32.56	11.11	24.86	4.43
29.8	30.0	32.63	10.75	24.98	
34.8	35.0	32.82	10.17	25.22	
39.8	40.0	32.86	9.72	25.33	
44.6	44.8	33.22	8.46	25.81	
49.5	49.8	33.22	8.44	25.81	2.99
59.7	60.0	33.40	8.00	26.02	
69.6	70.0	33.60	7.66	26.23	
74.6	75.0	33.68	7.51	26.31	2.29
80.5	81.0	33.70	7.47	26.33	
90.4	91.0	33.73	7.40	26.37	
100.4	101.1	33.80	7.26	26.44	1.86
103.4	104.1	33.80	7.25	26.44	

CRUISE NO: 15 CODE	TAPE: U00454 -436
LAT N 48 28.90	LONG W 125 21.80
DATE 22/10/80	PASS NO. 9
TIME (PST) 2120	STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.6	2.6	32.39	11.44	24.67
4.9	5.0	32.44	11.44	24.71
10.0	10.1	32.44	11.43	24.71
14.9	15.0	32.47	11.34	24.75
19.8	19.9	32.52	10.98	24.85
24.8	24.9	32.69	10.16	25.13
30.0	30.1	32.95	9.20	25.49
34.9	35.0	33.02	8.95	25.58
39.8	40.0	33.21	8.52	25.79
44.6	44.8	33.33	8.24	25.93
49.7	50.0	33.38	8.14	25.98
59.6	59.9	33.60	7.68	26.22
69.7	70.1	33.68	7.46	26.32
80.5	81.0	33.76	7.35	26.40
90.5	91.1	33.82	7.22	26.46
100.4	101.1	33.86	7.14	26.50
110.2	110.9	33.87	7.08	26.52
120.1	121.0	33.87	7.08	26.52
125.3	126.1	33.87	7.08	26.52

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15 CODE
LAT N 48 25.50
DATE 22/10/80
TIME (PST) 2208

TAPE: U00454 -437
LONG W 125 28.30
PASS NO. 11
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.4	2.4	32.51	11.21	24.80	
5.1	5.1	32.50	11.21	24.80	
10.0	10.1	32.51	11.21	24.80	5.99
14.9	15.0	32.51	11.21	24.80	
20.0	20.1	32.51	11.21	24.81	
24.8	24.9	32.52	11.21	24.81	5.95
30.0	30.1	32.53	11.18	24.82	
34.8	35.0	32.67	10.74	25.01	
39.7	40.0	33.04	9.49	25.51	
44.7	44.9	33.25	8.63	25.81	
49.6	49.9	33.45	7.97	26.06	2.38
59.6	60.0	33.59	7.61	26.23	
69.5	69.9	33.68	7.41	26.32	
74.6	75.0	33.74	7.32	26.38	2.00
79.6	80.1	33.80	7.23	26.44	
90.5	91.1	33.84	7.14	26.49	
100.2	100.9	33.87	7.17	26.50	1.74
110.3	111.0	33.87	7.14	26.51	
120.2	121.0	33.88	7.08	26.53	
125.[illegible]	125.9	33.89	7.04	26.54	1.47
130.0	130.9	33.89	7.00	26.54	
140.2	141.2	33.89	6.97	26.55	
149.9	150.9	33.89	6.94	26.55	1.09
153.8	154.9	33.89	6.94	26.55	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15   CODE   TAPE: U00454   -438
LAT N 46 22.00   LONG W 125 34.70
DATE 22/10/80   PASS NO. 13
TIME (PST) 2313   STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	32.49	11.47	24.74
5.1	5.1	32.49	11.47	24.74
9.9	10.0	32.49	11.47	24.74
14.9	14.9	32.49	11.48	24.74
20.0	20.1	32.50	11.45	24.75
24.9	25.0	32.94	9.85	25.37
29.9	30.1	33.04	9.32	25.54
34.9	35.1	33.21	8.69	25.77
39.9	40.1	33.27	8.47	25.85
44.8	45.0	33.40	8.13	26.00
49.7	49.9	33.48	7.92	26.09
59.7	60.0	33.55	7.74	26.18
69.7	70.1	33.66	7.53	26.29
80.4	81.0	33.71	7.40	26.35
89.7	90.2	33.75	7.32	26.39
100.4	101.1	33.78	7.25	26.43
110.3	111.0	33.82	7.11	26.48
120.1	121.0	33.86	7.03	26.52
130.2	131.1	33.87	7.03	26.52
133.0	133.9	33.86	7.03	26.52

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15   CODE                                  TAPE: U00454    -439
LAT  N 48 18.60                                       LONG W 125 41.20
DATE 23/10/80                                         PASS NO. 15
TIME (PST) 0003                                       STN: 107

 DEPTH      PRESS       SAL       TEMP    SIGMA-T    OXYGEN
   2.3        2.3     32.15      11.22     24.52
   4.6        4.7     32.20      11.22     24.56
  10.2       10.2     32.21      11.18     24.58      4.49
  14.9       15.0     32.17      11.08     24.56
  19.9       20.0     32.36       9.92     24.90
  24.7       24.8     32.41       9.40     25.03      3.75
  29.9       30.0     32.57       9.20     25.19
  34.9       35.1     32.70       9.40     25.25
  39.9       40.1     32.86       8.94     25.46
  44.8       45.0     32.94       8.74     25.55
  49.7       50.0     33.04       8.58     25.65      3.02
  60.4       60.8     33.19       8.34     25.80
  69.7       70.1     33.36       8.06     25.98
  75.4       75.9     33.43       7.91     26.05      3.14
  80.5       81.0     33.49       7.81     26.12
  89.6       90.1     33.53       7.72     26.16
 100.4      101.0     33.69       7.40     26.33      2.41
 110.2      110.9     33.81       7.18     26.46
 120.2      121.0     33.92       7.09     26.56
 125.3      126.1     33.93       7.10     26.57      2.03
 130.4      131.2     33.93       7.11     26.56
 135.1      136.0     33.93       7.11     26.56      2.04
 140.0      140.9     33.94       7.07     26.57
 141.9      142.8     33.94       7.04     26.58
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15 CODE
LAT N 48 15.10
DATE 23/10/80
TIME (PST) 0119

TAPE: U00454 -440
LONG W 125 47.70
PASS NO. 17
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.7	3.7	32.32	13.15	24.29
5.0	5.0	32.32	13.15	24.29
10.0	10.0	32.32	13.16	24.29
15.0	15.1	32.32	13.15	24.29
19.9	20.0	32.32	13.11	24.30
24.9	25.0	32.57	11.57	24.78
29.8	29.9	32.59	10.00	25.08
34.8	35.0	32.66	8.96	25.30
39.8	40.0	32.65	8.65	25.33
44.6	44.9	32.70	8.42	25.41
49.8	50.1	32.84	8.61	25.49
59.6	59.9	32.98	8.75	25.58
69.7	70.1	33.08	8.51	25.69
79.5	80.0	33.25	8.22	25.87
90.5	91.0	33.43	7.91	26.06
100.5	101.1	33.52	7.74	26.15
110.2	110.9	33.66	7.59	26.28
120.3	121.1	33.81	7.43	26.42
130.1	130.9	33.86	7.43	26.46
140.1	141.0	33.86	7.40	26.47
150.0	151.0	33.88	7.34	26.49
160.0	161.1	33.91	7.24	26.53
169.9	171.1	33.93	7.20	26.55
180.0	181.2	33.93	7.15	26.56
184.4	185.6	33.93	7.14	26.56

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15   CODE                                  TAPE: UO0454   -441
LAT  N 48 12.90                                       LONG W 125 52.00
DATE 23/10/80                                         PASS NO. 19
TIME (PST) 0153                                       STN: 109

 DEPTH      PRESS       SAL        TEMP     SIGMA-T
   2.6        2.6      32.30      13.46      24.21
   4.8        4.9      32.31      13.45      24.22
  10.0       10.1      32.33      13.45      24.24
  15.1       15.1      32.33      13.45      24.24
  19.9       20.0      32.33      13.44      24.24
  24.9       25.0      32.34      13.44      24.25
  30.0       30.1      32.63      10.64      24.99
  34.8       35.0      32.62       9.24      25.22
  39.9       40.1      32.64       8.65      25.32
  44.8       45.0      32.68       8.53      25.38
  49.7       50.0      32.69       8.43      25.40
  59.6       59.9      32.82       8.14      25.55
  70.4       70.8      33.05       7.92      25.75
  79.7       80.1      33.28       7.94      25.93
  89.5       90.0      33.42       7.90      26.05
 100.4      101.0      33.56       7.79      26.18
 110.4      111.1      33.75       7.61      26.35
 120.4      121.2      33.84       7.51      26.43
 130.3      131.1      33.87       7.43      26.47
 140.0      140.9      33.88       7.32      26.50
 150.2      151.2      33.89       7.29      26.51
 159.9      160.9      33.91       7.24      26.53
 169.5      170.6      33.91       7.20      26.54
 179.7      180.9      33.93       7.21      26.55
 189.9      191.2      33.94       7.16      26.56
 199.6      200.9      33.94       7.11      26.57
 225.4      227.0      33.96       7.00      26.60
 250.3      252.1      33.98       6.90      26.63
 275.1      277.1      33.99       6.80      26.65
 300.0      302.2      33.99       6.63      26.68
 324.7      327.1      34.02       6.22      26.75
 350.4      353.0      34.05       5.62      26.85
 375.1      377.9      34.06       5.49      26.87
 397.0      400.1      34.06       5.40      26.89
```

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 15 CODE
LAT N 48 10.60
DATE 23/10/80
TIME (PST) 0244

TAPE: U00454 -442
LONG W 125 56.20
PASS NO. 21
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.6	3.6	32.36	13.97	24.16
4.9	5.0	32.36	13.97	24.16
10.0	10.0	32.37	13.97	24.16
15.1	15.1	32.36	13.98	24.16
20.0	20.1	32.36	13.97	24.16
25.1	25.2	32.58	10.88	24.92
30.0	30.2	32.57	10.34	25.00
34.6	34.8	32.61	9.39	25.19
39.8	40.0	32.63	8.83	25.29
44.8	45.0	32.60	8.65	25.30
49.7	49.9	32.62	8.41	25.35
59.7	60.0	32.73	8.31	25.45
69.7	70.0	32.93	8.09	25.64
80.5	81.0	33.21	8.07	25.86
89.5	90.1	33.40	7.87	26.04
100.3	100.9	33.62	7.66	26.24
110.5	111.2	33.72	7.58	26.33
120.2	121.0	33.81	7.54	26.41
130.1	130.9	33.87	7.46	26.47
140.1	141.0	33.89	7.43	26.48
150.6	151.6	33.90	7.34	26.51
159.9	161.0	33.92	7.29	26.53
169.7	170.8	33.92	7.21	26.54
179.8	181.0	33.93	7.14	26.56
189.7	191.0	33.95	7.12	26.57
199.8	201.1	33.96	7.10	26.59
225.4	226.9	33.97	7.02	26.61
250.4	252.2	33.98	6.96	26.62
275.0	276.9	33.98	6.87	26.64
299.9	302.0	33.99	6.77	26.66
324.6	327.0	34.00	6.62	26.68
350.3	353.0	34.02	6.37	26.73
375.2	378.0	34.02	6.03	26.78
399.8	402.8	34.04	5.79	26.82
424.8	428.1	34.05	5.50	26.87
439.4	442.9	34.07	5.40	26.90

Data Listings 1981

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 16   CODE                          TAPE: U00454   -443
LAT  N 48 39.00                               LONG W 125  2.50
DATE 27/11/80                                 PASS NO.  1
TIME (PST) 1249                               STN: 101

 DEPTH      PRESS       SAL       TEMP    SIGMA-T
   4.2        4.2     29.91      10.39     22.92
   5.1        5.1     29.92      10.39     22.92
  10.2       10.2     30.31      10.58     23.20
  14.9       15.0     31.13      10.95     23.77
  20.1       20.2     31.18      10.89     23.83
  24.8       24.9     31.33      11.01     23.92
  30.0       30.1     31.65      10.79     24.21
  34.9       35.0     31.65      10.60     24.24
  40.0       40.2     31.75      10.02     24.41
  44.9       45.1     31.94       9.56     24.64
  49.8       50.0     31.98       9.57     24.66
  59.7       60.0     32.47       9.08     25.13
  69.5       69.9     32.83       8.73     25.47
  79.6       80.0     32.84       8.73     25.47

CRUISE NO:  17   CODE                         TAPE: U00454   -444
LAT  N 48 39.00                               LONG W 125  2.50
DATE  6/ 1/81                                 PASS NO.  1
TIME (PST) 0807                               STN: 101

 DEPTH      PRESS       SAL       TEMP    SIGMA-T   OXYGEN
   2.3        2.3     27.44       9.67     21.11
   5.0        5.1     27.50       9.73     21.15
   9.9        9.9     28.08       9.75     21.59     6.51
  15.1       15.1     28.73       9.73     22.10
  19.9       19.9     29.03       9.70     22.34
  24.9       25.0     29.60       9.59     22.81     6.39
  30.0       30.1     29.70       9.58     22.88
  34.8       34.9     29.98       9.60     23.10
  39.9       40.0     30.20       9.49     23.29
  44.9       45.0     31.09       9.32     24.01
  49.9       50.1     31.52       9.23     24.36
  57.3       57.6     32.08       9.23     24.80
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 17 CODE TAPE: U00454 -445
LAT N 48 35.60 LONG W 125 9.00
DATE 6/ 1/81 PASS NO. 3
TIME (PST) 0912 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.9	3.9	27.15	9.95	20.84
5.0	5.0	27.20	9.94	20.88
10.1	10.1	28.58	9.77	21.98
14.7	14.7	28.94	9.69	22.27
20.0	20.0	29.19	9.66	22.47
24.9	25.0	29.75	9.65	22.91
29.9	30.0	29.82	9.60	22.97
34.8	34.9	30.02	9.57	23.14
39.9	40.0	30.25	9.49	23.33
45.0	45.1	30.74	9.35	23.73
49.9	50.1	31.39	8.93	24.31
59.8	60.0	31.43	8.68	24.37
69.7	70.0	31.80	8.98	24.62
79.7	80.1	32.15	9.41	24.82
89.7	90.0	32.46	9.49	25.05
99.9	100.3	32.80	9.26	25.36
110.5	111.0	32.82	9.25	25.37
113.3	113.8	32.82	9.25	25.37

CRUISE NO: 17 CODE TAPE: U00454 -446
LAT N 48 32.20 LONG W 125 15.50
DATE 6/ 1/81 PASS NO. 5
TIME (PST) 0957 STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.7	3.7	27.80	10.04	21.33	
4.9	5.0	27.81	10.04	21.34	
10.0	10.0	27.80	10.05	21.33	6.47
15.0	15.0	29.44	10.34	22.56	
20.0	20.1	30.76	9.94	23.66	
24.9	25.0	30.95	9.40	23.89	5.54
29.9	30.0	31.09	9.14	24.04	
34.8	34.9	31.29	8.95	24.23	
39.9	40.0	31.53	9.01	24.40	
44.9	45.1	31.61	8.83	24.49	
49.8	50.0	31.64	8.88	24.51	5.01
59.9	60.1	31.97	9.25	24.71	
69.9	70.2	32.30	9.68	24.90	
80.5	80.9	32.52	9.67	25.08	
89.6	90.0	32.95	9.17	25.49	
99.6	100.1	33.19	8.84	25.72	3.84
110.4	111.0	33.39	8.46	25.95	
112.5	113.1	33.40	8.45	25.95	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 17   CODE
LAT N 48 28.90
DATE 6/ 1/81
TIME (PST) 1048

TAPE: U00454   -447
LONG W 125 21.80
PASS NO. 7
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.3	3.3	30.18	9.90	23.21
5.1	5.1	30.20	9.90	23.22
10.0	10.0	30.29	9.88	23.30
14.9	15.0	30.44	9.67	23.45
19.9	20.0	30.60	9.65	23.57
24.9	25.0	30.95	9.22	23.92
29.9	30.0	31.18	9.10	24.12
34.8	35.0	31.34	8.98	24.26
39.8	39.9	31.57	8.93	24.44
44.9	45.1	31.62	8.94	24.49
49.6	49.8	31.63	8.97	24.49
59.8	60.1	31.76	8.94	24.59
69.5	69.9	31.99	9.32	24.72
79.8	80.2	32.60	10.15	25.06
89.6	90.0	32.76	9.76	25.25
100.4	100.9	33.02	9.22	25.53
110.3	110.9	33.15	9.08	25.66
120.4	121.0	33.37	8.70	25.89
130.4	131.1	33.54	8.31	26.08
140.4	141.2	33.65	8.04	26.21
150.0	150.9	33.68	8.02	26.23
150.0	150.9	33.68	8.02	26.23

CRUISE NO: 17   CODE
LAT N 48 25.50
DATE 6/ 1/81
TIME (PST) 1137

TAPE: U00454   -448
LONG W 125 28.30
PASS NO. 9
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.9	4.9	30.47	9.12	23.56	
10.1	10.1	30.59	9.16	23.65	5.84
14.9	14.9	30.63	9.19	23.67	
19.9	20.0	30.96	9.91	23.82	
24.9	25.0	31.06	8.80	24.07	5.35
29.7	29.9	31.37	9.97	24.13	
34.9	35.0	31.48	10.14	24.18	
39.8	39.9	31.68	10.26	24.32	
44.8	45.0	31.72	10.30	24.35	
49.8	50.1	31.77	10.33	24.38	5.97
59.8	60.1	32.15	10.70	24.61	
69.7	70.0	32.23	10.75	24.67	
74.6	75.0	32.32	10.76	24.73	6.25
79.6	79.9	32.46	10.72	24.85	
89.7	90.1	32.49	10.60	24.89	
100.5	101.0	32.56	10.49	24.97	5.71
109.5	110.1	32.60	10.38	25.02	
120.3	121.0	33.00	9.40	25.49	
125.3	126.0	33.29	8.77	25.81	3.87
130.2	130.9	33.31	8.72	25.84	
133.4	134.1	33.34	8.66	25.87	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 17 CODE
LAT N 48 22.00
DATE 6/ 1/81
TIME (PST) 1229

TAPE: U00454 -449
LONG W 125 34.70
PASS NO. 11
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.4	2.4	31.46	9.13	24.33
4.5	4.6	31.48	9.18	24.33
10.0	10.1	31.51	9.15	24.37
15.0	15.0	31.53	9.14	24.39
19.9	20.0	31.54	9.14	24.39
24.8	24.9	31.68	9.53	24.44
29.9	30.0	31.94	10.29	24.52
34.8	35.0	32.21	10.56	24.68
39.9	40.1	32.26	10.66	24.71
44.7	44.9	32.35	10.85	24.74
49.8	50.1	32.40	10.93	24.77
59.7	60.0	32.42	10.93	24.79
69.7	70.0	32.44	10.94	24.80
79.6	80.0	32.45	10.83	24.82
89.6	90.1	32.61	10.54	25.00
100.4	100.9	32.81	10.10	25.23
109.5	110.1	32.88	9.87	25.32
120.4	121.0	33.00	9.27	25.51
130.2	131.0	33.21	8.84	25.74
140.1	141.0	33.40	8.52	25.94
147.0	147.8	33.53	8.26	26.08

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 17 CODE
LAT N 48 18.60
DATE 6/ 1/81
TIME (PST) 1313

TAPE: U00454 -450
LONG W 125 41.20
PASS NO. 13
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.7	3.7	32.32	10.60	24.76	
4.9	4.9	32.40	10.59	24.83	
9.9	9.9	32.40	10.59	24.83	6.53
14.9	15.0	32.40	10.58	24.83	
19.9	20.0	32.41	10.58	24.83	
24.9	25.0	32.41	10.61	24.83	6.41
29.8	30.0	32.43	10.65	24.84	
34.8	35.0	32.45	10.69	24.85	
39.7	39.9	32.48	10.77	24.86	
44.6	44.9	32.59	10.80	24.94	
49.7	49.9	32.63	10.75	24.98	5.90
59.7	60.0	32.73	10.40	25.11	
69.5	69.8	32.85	9.69	25.33	
74.7	75.1	33.00	9.44	25.48	4.61
80.4	80.9	33.03	9.35	25.52	
89.6	90.1	33.10	9.22	25.60	
100.5	101.0	33.18	8.92	25.71	4.09
110.3	111.0	33.26	8.75	25.79	
120.3	121.1	33.40	8.51	25.94	
125.2	125.9	33.50	8.33	26.05	3.76
130.2	131.0	33.51	8.29	26.07	
140.1	141.0	33.63	8.15	26.18	
145.1	146.0	33.72	7.92	26.28	2.94
149.9	150.9	33.75	7.60	26.32	
153.0	153.9	33.86	7.49	26.45	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 17   CODE
LAT N 48 15.10
DATE 6/ 1/81
TIME (PST) 1410

TAPE: U00454   -451
LONG W 125 47.70
PASS NO. 15
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	32.34	10.06	24.87
4.8	4.8	32.34	10.05	24.87
9.9	10.0	32.34	10.04	24.87
14.9	15.0	32.34	10.03	24.87
19.8	19.9	32.34	10.03	24.87
24.9	25.1	32.34	10.02	24.88
30.0	30.1	32.34	10.02	24.87
34.8	35.0	32.34	9.99	24.88
39.8	40.1	32.34	9.94	24.89
44.7	44.9	32.34	9.85	24.90
49.8	50.1	32.34	9.78	24.92
59.6	60.0	32.51	9.50	25.09
69.6	70.0	32.92	9.65	25.39
79.5	79.9	33.04	9.24	25.55
89.5	90.1	33.05	8.97	25.60
99.7	100.3	33.19	8.86	25.73
110.2	110.9	33.41	8.43	25.96
120.3	121.0	33.46	8.35	26.02
130.2	131.0	33.50	8.27	26.06
140.2	141.1	33.53	8.24	26.09
149.9	150.9	33.58	8.20	26.13
160.0	161.0	33.76	7.88	26.32
170.0	171.1	33.79	7.81	26.35
179.7	180.8	33.86	7.52	26.45
189.7	190.9	33.88	7.42	26.48
199.6	200.9	33.92	7.18	26.55
224.6	226.1	33.95	6.96	26.60
231.4	233.0	33.95	6.95	26.60

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 17 CODE
LAT N 48 12.90
DATE 6/ 1/81
TIME (PST) 1446

TAPE: U00454 -452
LONG W 125 52.00
PASS NO. 17
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.3	4.3	32.36	10.31	24.84	
5.0	5.1	32.36	10.31	24.84	
9.9	10.0	32.36	10.31	24.84	
14.8	14.9	32.37	10.30	24.85	
19.7	19.8	32.37	10.30	24.85	
25.0	25.1	32.36	10.29	24.85	6.51
29.8	30.0	32.37	10.25	24.86	
34.8	35.0	32.35	10.08	24.87	
39.9	40.1	32.35	10.04	24.88	
44.8	45.1	32.35	9.95	24.89	
49.6	49.9	32.33	9.91	24.89	6.51
59.7	60.0	32.33	9.85	24.89	
69.5	69.9	32.41	9.55	25.01	
75.5	76.0	32.68	8.82	25.33	6.05
79.6	80.1	32.79	8.40	25.48	
89.7	90.2	33.02	8.56	25.64	
100.3	100.9	33.30	8.34	25.89	4.80
110.2	110.9	33.41	8.34	25.98	
120.3	121.1	33.48	8.30	26.04	
125.2	126.0	33.49	8.28	26.05	3.13
130.1	130.9	33.52	8.22	26.08	
140.1	141.0	33.64	8.15	26.18	
150.0	151.0	33.74	7.93	26.30	3.50
160.0	161.0	33.79	7.84	26.35	
170.1	171.2	33.82	7.81	26.38	
179.9	181.0	33.84	7.76	26.40	
189.9	191.1	33.87	7.65	26.44	
199.6	200.9	33.89	7.46	26.48	2.85
225.5	227.0	33.89	7.02	26.55	
250.4	252.1	33.94	6.86	26.60	3.40
275.2	277.1	33.97	6.65	26.66	
299.8	301.9	33.99	6.40	26.70	2.28
324.6	326.9	34.00	6.22	26.74	
350.3	352.9	34.00	5.91	26.77	
375.2	378.0	34.01	5.60	26.82	
400.0	403.0	34.00	5.35	26.85	
424.6	427.8	34.04	5.34	26.88	
449.5	453.0	34.06	5.20	26.91	
475.2	479.0	34.09	5.00	26.95	
497.9	501.8	34.10	4.94	26.97	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE                                    TAPE: U00454   -453
LAT  N 48 39.00                                         LONG W 125  2.50
DATE  4/ 2/81                                           PASS NO.  1
TIME (PST) 1838                                         STN: 101

 DEPTH      PRESS      SAL        TEMP     SIGMA-T    OXYGEN
   3.2        3.2     30.68       8.47      23.82
   5.7        5.8     30.68       8.47      23.81
  10.0       10.1     30.71       8.52      23.83
  15.0       15.0     30.80       8.56      23.90
  19.8       19.9     30.88       8.57      23.96
  24.9       25.0     30.96       8.57      24.02     5.90
  29.9       30.0     31.01       8.58      24.06
  34.8       35.0     31.07       8.62      24.10
  39.9       40.1     31.19       8.64      24.19
  44.8       45.0     31.22       8.57      24.23
  49.8       50.0     31.26       8.63      24.25     5.74
  49.8       50.0     31.26       8.63      24.25

CRUISE NO:  18   CODE                                   TAPE: U00454   -454
LAT  N 48 35.60                                         LONG W 125  9.00
DATE  4/ 2/81                                           PASS NO.  3
TIME (PST) 1946                                         STN: 102

 DEPTH      PRESS      SAL        TEMP     SIGMA-T
   3.3        3.3     31.45       8.61      24.40
   5.0        5.0     31.44       8.63      24.39
  10.0       10.1     31.44       8.69      24.38
  15.0       15.0     31.60       8.97      24.47
  19.9       20.0     31.67       9.04      24.51
  25.0       25.1     31.67       9.08      24.50
  29.8       29.9     31.71       9.16      24.52
  34.7       34.8     31.71       9.14      24.53
  40.0       40.2     31.72       9.13      24.53
  44.6       44.8     31.72       9.13      24.53
  49.8       50.0     31.72       9.15      24.53
  59.7       60.0     31.73       9.14      24.54
  69.7       70.1     31.76       9.35      24.53
  79.6       80.0     32.29      10.37      24.78
  90.5       91.0     32.52      10.57      24.92
 100.3      100.9     32.60      10.56      24.99
 104.4      104.9     32.65      10.56      25.02
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18 CODE
LAT N 48 32.20
DATE 4/ 2/81
TIME (PST) 2033

TAPE: U00454 -455
LONG W 125 15.50
PASS NO. 5
STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.1	4.1	31.81	9.78	24.50	
5.0	5.1	31.81	9.76	24.50	
9.9	10.0	31.85	9.72	24.54	
14.9	15.0	31.86	9.72	24.55	
20.0	20.1	31.87	9.73	24.55	
24.9	25.0	31.87	9.74	24.56	6.07
29.8	30.0	31.87	9.74	24.56	
34.7	34.9	31.89	9.91	24.54	
39.8	40.0	31.98	10.05	24.59	
44.7	45.0	32.21	10.51	24.69	
49.7	49.9	32.31	10.55	24.76	6.14
59.9	60.2	32.39	10.58	24.82	
69.7	70.0	32.49	10.69	24.88	
74.6	75.0	32.52	10.74	24.89	6.07
80.5	80.9	32.53	10.68	24.91	
90.4	90.9	32.58	10.52	24.98	
100.5	101.0	32.72	10.28	25.13	5.52
106.1	106.7	32.79	10.23	25.19	

CRUISE NO: 18 CODE
LAT N 48 28.90
DATE 4/ 2/81
TIME (PST) 2127

TAPE: U00454 -456
LONG W 125 21.80
PASS NO. 7
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.1	4.2	32.10	10.19	24.66
5.6	5.7	32.11	10.20	24.67
10.0	10.1	32.14	10.30	24.67
15.0	15.0	32.18	10.32	24.70
19.9	20.0	32.21	10.37	24.71
24.9	25.0	32.21	10.40	24.71
29.8	29.9	32.23	10.45	24.71
34.9	35.1	32.40	10.86	24.78
39.7	40.0	32.49	10.94	24.84
44.7	45.0	32.53	10.96	24.86
49.8	50.0	32.53	10.90	24.87
59.8	60.1	32.59	10.93	24.92
69.5	69.9	32.71	10.98	25.00
79.5	79.9	32.83	10.78	25.13
89.6	90.1	32.89	10.66	25.19
100.4	101.0	32.95	10.36	25.30
110.4	111.0	32.95	9.89	25.37
120.3	121.0	32.97	9.78	25.41
129.2	130.0	33.04	9.60	25.49
140.7	141.5	33.17	9.24	25.65
142.2	143.1	33.17	9.19	25.66

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE   TAPE: U00454   -457
LAT N 48 25.50   LONG W 125 28.30
DATE 4/ 2/81   PASS NO. 9
TIME (PST) 2220   STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.9	3.9	32.16	9.92	24.75	
4.9	4.9	32.16	9.92	24.75	
9.9	10.0	32.16	9.92	24.75	
14.9	15.0	32.16	9.93	24.75	
20.0	20.1	32.17	9.96	24.75	
24.8	25.0	32.19	9.99	24.76	6.42
29.7	29.9	32.20	10.07	24.76	
34.7	34.9	32.26	10.14	24.79	
39.8	40.0	32.37	10.39	24.84	
44.7	44.9	32.42	10.46	24.86	
49.8	50.1	32.43	10.49	24.87	6.07
59.7	60.0	32.54	10.58	24.93	
69.5	69.8	32.69	10.44	25.08	
74.6	75.0	32.76	10.30	25.16	5.34
79.5	79.9	32.78	10.26	25.18	
90.5	91.0	32.88	10.02	25.29	
100.5	101.0	32.88	10.01	25.30	5.08
110.3	111.0	32.95	9.81	25.38	
120.3	121.0	32.99	9.66	25.44	
125.3	126.0	33.01	9.61	25.46	4.66
130.0	130.8	33.07	9.49	25.53	
140.1	140.9	33.16	9.26	25.64	
146.0	146.9	33.16	9.24	25.64	

CRUISE NO: 18   CODE   TAPE: U00454   -458
LAT N 48 22.00   LONG W 125 34.70
DATE 4/ 2/81   PASS NO. 11
TIME (PST) 2316   STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
10.0	10.1	32.37	10.14	24.88
14.8	14.9	32.37	10.14	24.88
19.9	20.0	32.37	10.14	24.88
24.9	25.0	32.37	10.14	24.88
30.0	30.1	32.37	10.20	24.87
34.9	35.0	32.51	10.49	24.93
39.8	40.0	32.51	10.37	24.95
44.7	45.0	32.53	10.38	24.96
49.7	49.9	32.54	10.39	24.97
59.6	60.0	32.57	10.47	24.98
69.7	70.1	32.59	10.51	24.99
79.6	80.0	32.74	10.40	25.12
90.5	91.0	32.91	10.72	25.20
100.4	100.9	32.92	10.39	25.26
110.3	110.9	33.04	10.26	25.38
120.2	120.9	33.32	9.59	25.71
130.3	131.1	33.42	9.17	25.86
140.4	141.3	33.42	9.10	25.87
142.9	143.8	33.43	9.09	25.87

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE                              TAPE: U00454    -459
LAT  N 48 18.60                                   LONG W 125 41.20
DATE  5/ 2/81                                     PASS NO. 13
TIME (PST) 0010                                   STN: 107

 DEPTH      PRESS       SAL        TEMP     SIGMA-T    OXYGEN
   3.5        3.6      32.52      10.46      24.94
   4.8        4.8      32.53      10.46      24.95
  10.0       10.1      32.52      10.46      24.94
  15.0       15.1      32.52      10.46      24.94
  20.0       20.1      32.52      10.46      24.94
  24.9       25.0      32.52      10.45      24.94      6.35
  29.8       30.0      32.53      10.41      24.96
  34.8       35.0      32.53      10.34      24.97
  39.7       39.9      32.53      10.34      24.97
  44.9       45.1      32.53      10.35      24.97
  49.8       50.1      32.53      10.35      24.97      6.32
  59.7       60.1      32.56      10.49      24.97
  69.6       70.0      32.80      10.92      25.08
  74.6       75.0      32.91      10.80      25.19      5.95
  79.5       80.0      32.97      10.75      25.24
  89.5       90.0      33.10      10.53      25.38
 100.3      100.9      33.16      10.41      25.45      4.90
 110.3      111.0      33.22      10.27      25.52
 120.3      121.0      33.25      10.21      25.55
 125.2      125.9      33.26      10.13      25.57      4.59
 130.2      131.0      33.28       9.93      25.62
 140.2      141.0      33.37       9.58      25.75
 142.9      143.7      33.37       9.56      25.75
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18    CODE                                        TAPE: U00454    -460
LAT   N 48 15.10                                             LONG W 125 47.70
DATE  5/ 2/81                                                PASS NO. 15
TIME (PST) 0115                                              STN: 108

 DEPTH        PRESS        SAL         TEMP      SIGMA-T
   3.7          3.7       32.54       10.37       24.97
   4.9          5.0       32.53       10.38       24.97
   9.9          9.9       32.53       10.37       24.97
  15.0         15.1       32.53       10.37       24.96
  19.9         20.0       32.53       10.37       24.96
  24.8         25.0       32.53       10.37       24.97
  29.8         30.0       32.53       10.36       24.97
  34.9         35.1       32.53       10.36       24.97
  39.7         39.9       32.54       10.41       24.97
  44.7         44.9       32.55       10.46       24.97
  49.7         50.0       32.58       10.55       24.97
  60.3         60.6       32.73       10.92       25.03
  69.5         69.9       32.79       10.93       25.07
  79.6         80.1       32.94       10.71       25.22
  90.5         91.0       33.04       10.45       25.35
 100.4        101.0       33.13       10.29       25.45
 110.3        111.0       33.28       10.01       25.61
 120.3        121.0       33.33        9.71       25.70
 130.3        131.1       33.42        9.56       25.79
 140.2        141.1       33.47        9.24       25.89
 150.0        150.9       33.49        8.90       25.95
 159.9        160.9       33.56        8.69       26.04
 169.9        171.0       33.60        8.42       26.11
 179.9        181.0       33.76        7.97       26.31
 189.7        190.9       33.87        7.55       26.45
 199.7        201.0       33.90        7.37       26.50
 224.6        226.1       33.92        7.17       26.55
 250.2        251.9       33.94        6.87       26.61
 275.0        276.9       33.96        6.70       26.64
 283.1        285.0       33.97        6.56       26.67
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE
LAT N 48 12.90
DATE 5/ 2/81
TIME (PST) 0201

TAPE: U00454   -461
LONG W 125 52.00
PASS NO. 17
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.8	3.9	32.54	10.59	24.93	
5.1	5.2	32.57	10.57	24.96	
10.0	10.1	32.57	10.58	24.96	
15.0	15.1	32.58	10.60	24.96	
19.9	20.0	32.59	10.65	24.96	
24.8	25.0	32.59	10.66	24.96	6.28
30.0	30.1	32.60	10.69	24.96	
34.9	35.1	32.59	10.63	24.97	
39.7	40.0	32.59	10.61	24.97	
44.9	45.1	32.62	10.72	24.97	
50.1	50.4	32.65	10.87	24.97	5.97
59.7	60.0	32.69	10.96	24.99	
69.6	70.0	32.78	10.73	25.09	
74.5	74.9	32.77	10.64	25.10	5.45
79.6	80.1	32.92	10.65	25.22	
90.3	90.8	33.18	10.14	25.51	
100.5	101.1	33.25	9.94	25.59	4.51
110.3	111.0	33.27	9.89	25.62	
120.3	121.0	33.41	9.70	25.76	
125.3	126.1	33.43	9.70	25.78	3.99
130.2	131.0	33.44	9.66	25.79	
140.1	141.0	33.50	9.44	25.88	
150.0	150.9	33.61	8.98	26.04	3.33
160.0	161.0	33.68	8.75	26.12	
170.0	171.0	33.65	8.36	26.16	
179.7	180.9	33.71	8.50	26.19	
189.7	190.9	33.73	8.40	26.22	
199.7	201.0	33.79	8.04	26.32	2.96
225.4	226.9	33.89	7.42	26.49	
250.3	252.0	33.95	7.02	26.59	2.58
275.1	277.0	33.95	6.89	26.61	
300.0	302.1	33.98	6.56	26.67	2.27
324.7	327.0	33.98	6.46	26.69	
350.4	352.9	33.99	6.29	26.72	
375.1	377.9	34.00	6.06	26.76	
400.0	403.0	34.01	5.86	26.79	1.82
424.7	427.9	34.01	5.76	26.81	
447.5	450.9	34.06	5.13	26.92	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18 CODE
LAT N 48 10.60
DATE 5/ 2/81
TIME (PST) 0338

TAPE: U00454 -462
LONG W 125 56.20
PASS NO. 19
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.4	3.4	32.48	10.25	24.95
4.9	4.9	32.53	10.25	24.99
10.1	10.1	32.53	10.25	24.99
14.9	15.0	32.54	10.25	24.99
19.9	20.0	32.53	10.26	24.98
24.9	25.1	32.54	10.26	24.99
29.8	30.0	32.54	10.26	24.99
34.8	35.0	32.54	10.27	24.99
39.6	39.8	32.57	10.42	24.99
44.7	44.9	32.60	10.47	25.00
49.7	49.9	32.65	10.59	25.02
59.7	60.1	32.74	10.63	25.08
69.6	70.0	32.96	10.78	25.23
79.5	79.9	33.16	10.03	25.51
89.5	90.0	33.31	9.68	25.69
100.4	101.0	33.38	9.46	25.78
110.2	110.9	33.51	9.18	25.92
120.1	120.8	33.65	8.70	26.11
130.2	131.0	33.69	8.52	26.17
140.2	141.1	33.71	8.37	26.21
150.0	151.0	33.74	8.26	26.24
160.0	161.1	33.76	8.05	26.30
169.9	171.0	33.78	8.00	26.32
179.9	181.1	33.80	7.93	26.34
189.8	191.1	33.81	7.88	26.36
199.5	200.9	33.87	7.66	26.44
224.6	226.2	33.93	7.36	26.53
250.3	252.0	33.95	7.26	26.55
275.0	277.0	33.96	7.06	26.60
299.8	302.0	33.96	6.99	26.61
324.5	326.9	33.98	6.77	26.65
350.4	352.9	33.98	6.61	26.67
375.1	377.9	33.99	6.24	26.73
400.0	403.0	33.99	6.10	26.75
424.7	427.9	34.01	5.91	26.78
449.5	453.0	34.02	5.70	26.82
475.1	478.8	34.03	5.48	26.85
500.1	504.1	34.06	5.12	26.92
503.0	507.0	34.07	5.06	26.93

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE                                  TAPE: U00454    -463
LAT  N 48  8.50                                       LONG W 126    .00
DATE  5/ 2/81                                         PASS NO. 21
TIME (PST) 0424                                       STN: 111

 DEPTH        PRESS       SAL        TEMP     SIGMA-T    OXYGEN
   3.0          3.0      32.59      10.70      24.95
   5.3          5.3      32.59      10.71      24.95
  10.0         10.0      32.60      10.72      24.96
  14.9         15.0      32.59      10.68      24.96
  19.9         20.0      32.59      10.65      24.97
  24.9         25.0      32.55      10.37      24.98      6.36
  29.9         30.1      32.58      10.44      24.99
  34.9         35.1      32.57      10.39      24.99
  39.9         40.1      32.58      10.40      25.00
  44.8         45.0      32.67      10.78      25.00
  49.8         50.0      32.71      10.74      25.04      6.16
  59.6         60.0      32.78      10.51      25.13
  69.7         70.1      32.93      10.34      25.28
  74.5         74.9      33.04      10.31      25.37      5.34
  80.5         81.0      33.19      10.16      25.51
  89.5         90.1      33.17       9.17      25.66
 100.4        101.0      33.53       9.41      25.90      3.72
 110.3        111.0      33.61       9.11      26.01
 120.2        121.0      33.69       8.81      26.12
 125.2        125.9      33.72       8.74      26.16      3.05
 130.2        131.0      33.72       8.63      26.18
 140.2        141.0      33.74       8.30      26.24
 150.1        151.0      33.74       8.15      26.26      3.16
 159.8        160.9      33.78       8.02      26.32
 169.8        170.9      33.83       7.81      26.38
 179.6        180.8      33.86       7.69      26.42
 189.9        191.1      33.89       7.54      26.47
 199.8        201.1      33.92       7.43      26.51      2.65
 225.2        226.8      33.94       7.18      26.56
 250.2        251.9      33.96       7.06      26.59      2.58
 275.1        277.1      33.97       6.93      26.62
 299.5        301.7      33.98       6.83      26.64      2.34
 324.6        327.0      33.98       6.67      26.66
 350.3        352.9      33.99       6.38      26.70
 375.2        378.0      33.99       6.24      26.73
 400.0        403.0      33.99       6.16      26.74
 424.7        428.0      34.01       6.00      26.77
 450.4        453.9      34.02       5.65      26.82
 475.3        479.1      34.04       5.32      26.88
 496.7        500.6      34.05       5.23      26.90
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18 CODE TAPE: U00454 -464
LAT N 48 24.40 LONG W 126 15.42
DATE 5/ 2/81 PASS NO. 23
TIME (PST) 0652 STN: A.P. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.8	3.8	32.41	10.19	24.90	
4.9	5.0	32.42	10.20	24.90	
9.9	10.0	32.42	10.21	24.90	
14.9	15.0	32.45	10.28	24.92	
20.0	20.1	32.46	10.31	24.92	
24.8	25.0	32.52	10.49	24.94	6.43
29.7	29.9	32.49	10.30	24.95	
34.7	34.9	32.48	10.22	24.95	
39.8	40.0	32.49	10.19	24.96	
44.8	45.0	32.49	10.17	24.96	
49.7	50.0	32.49	10.13	24.98	6.35
59.7	60.1	32.69	10.46	25.08	
69.7	70.1	32.86	10.46	25.21	
74.5	75.0	32.93	10.32	25.29	5.26
80.5	81.0	33.07	10.25	25.40	
89.6	90.1	33.21	9.70	25.61	
99.5	100.1	33.23	9.30	25.69	3.87
110.4	111.1	33.31	8.97	25.80	
120.2	120.9	33.38	8.85	25.88	
125.4	126.1	33.42	8.74	25.92	3.89
130.3	131.1	33.47	8.56	25.99	
140.0	140.9	33.51	8.46	26.04	
150.0	151.0	33.53	8.40	26.06	3.54
159.9	160.9	33.58	8.34	26.11	
170.2	171.2	33.64	8.22	26.17	
179.8	181.0	33.74	7.96	26.29	
189.8	191.0	33.80	7.77	26.36	
199.8	201.1	33.82	7.69	26.39	2.88
224.6	226.1	33.90	7.43	26.49	
250.2	251.9	33.95	7.02	26.59	2.52
275.1	277.0	33.98	6.71	26.66	
299.9	302.0	33.99	6.48	26.69	
324.7	327.1	33.99	6.26	26.72	
350.4	353.0	34.00	6.02	26.76	
375.2	378.0	34.00	5.77	26.80	
400.2	403.2	34.02	5.48	26.84	
424.8	428.0	34.04	5.33	26.88	
449.5	453.0	34.08	5.21	26.92	
475.2	479.0	34.09	5.05	26.95	
499.0	503.0	34.10	4.91	26.97	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18 CODE
LAT N 48 29.06
DATE 5/ 2/81
TIME (PST) 0828

TAPE: U00454 -465
LONG W 126 9.48
PASS NO. 25
STN: A.P. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.6	3.7	32.32	10.04	24.86
5.1	5.2	32.32	10.04	24.85
10.0	10.0	32.33	10.05	24.86
15.0	15.1	32.40	10.10	24.91
19.9	20.0	32.47	10.18	24.95
24.8	24.9	32.47	10.16	24.95
29.8	30.0	32.47	10.15	24.96
34.7	34.9	32.47	10.12	24.96
39.7	39.9	32.48	10.12	24.97
44.8	45.0	32.48	10.11	24.97
49.6	49.9	32.48	10.11	24.97
59.7	60.0	32.48	10.11	24.97
69.7	70.1	32.58	10.19	25.04
79.5	80.0	32.90	10.12	25.29
89.6	90.1	32.99	10.13	25.36
100.3	100.9	33.17	9.63	25.58
110.4	111.0	33.28	9.22	25.74
120.2	121.0	33.39	8.90	25.87
130.2	131.0	33.49	8.77	25.97
140.2	141.1	33.58	8.76	26.05
150.0	151.0	33.63	8.60	26.11
159.9	160.9	33.67	8.25	26.20
169.9	171.0	33.74	7.89	26.30
179.8	180.9	33.87	7.48	26.47
189.8	191.0	33.92	7.24	26.53
199.8	201.1	33.94	7.07	26.58
224.6	226.1	33.97	6.83	26.63
250.2	252.0	33.98	6.55	26.67
251.3	253.0	33.98	6.55	26.67

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE   TAPE: U00454   -466
LAT N 48 33.24   LONG W 126 4.00
DATE 5/ 2/81   PASS NO. 27
TIME (PST) 0940   STN: A.P. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.8	3.8	31.83	9.74	24.53	
5.0	5.0	31.84	9.74	24.53	
9.9	10.0	31.84	9.74	24.53	
14.9	15.0	31.98	9.93	24.61	
19.9	20.0	32.16	10.16	24.71	
24.9	25.0	32.23	10.17	24.76	6.09
29.9	30.0	32.28	10.15	24.81	
34.8	35.0	32.31	10.17	24.83	
39.7	39.9	32.34	10.20	24.84	
44.9	45.1	32.36	10.21	24.86	
49.7	50.0	32.39	10.24	24.88	6.37
59.7	60.0	32.43	10.29	24.90	
69.7	70.1	32.57	10.62	24.95	
74.6	75.0	32.62	10.63	24.99	6.21
80.4	80.8	32.72	10.41	25.10	
90.5	91.0	32.85	10.41	25.21	
100.4	100.9	33.03	10.09	25.40	4.80
110.4	111.0	33.12	9.61	25.55	
120.4	121.1	33.48	8.53	26.00	
125.2	126.0	33.51	8.44	26.04	3.47
130.4	131.1	33.59	8.25	26.13	
140.2	141.0	33.77	7.73	26.35	
150.0	150.9	33.80	7.66	26.38	2.93
153.7	154.7	33.80	7.66	26.38	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18 CODE TAPE: U00454 -467
LAT N 48 37.36 LONG W 125 58.16
DATE 5/ 2/81 PASS NO. 29
TIME (PST) 1042 STN: A.P. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.1	4.1	31.53	9.47	24.33
4.8	4.8	31.52	9.48	24.33
9.9	10.0	31.62	9.67	24.37
14.9	14.9	31.74	9.77	24.45
19.9	20.0	31.81	9.75	24.50
24.9	25.0	31.88	9.87	24.54
29.7	29.9	32.02	10.07	24.61
34.8	35.0	32.10	10.13	24.67
39.9	40.1	32.13	10.13	24.69
44.7	44.9	32.20	10.25	24.72
49.7	50.0	32.27	10.35	24.76
59.7	60.0	32.35	10.29	24.83
69.6	69.9	32.47	10.41	24.91
79.6	80.0	32.67	10.29	25.09
89.6	90.1	32.78	10.15	25.20
100.4	101.0	33.05	9.48	25.52
110.4	111.0	33.09	9.37	25.57
110.4	111.0	33.09	9.37	25.57

CRUISE NO: 18 CODE TAPE: U00454 -468
LAT N 48 41.41 LONG W 125 52.38
DATE 5/ 2/81 PASS NO. 31
TIME (PST) 1134 STN: A.P. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.6	3.7	31.55	9.45	24.35	
5.1	5.1	31.55	9.46	24.35	
9.9	9.9	31.55	9.45	24.35	
14.9	15.0	31.55	9.44	24.35	
19.9	20.0	31.56	9.47	24.36	
24.9	25.0	31.59	9.48	24.37	6.21
29.7	29.8	31.67	9.49	24.44	
34.8	34.9	31.83	9.81	24.51	
39.8	40.0	32.07	10.12	24.65	
44.7	45.0	32.11	10.13	24.68	
49.8	50.0	32.30	10.23	24.81	5.82
59.6	59.9	32.38	10.23	24.87	
64.6	65.0	32.39	10.23	24.88	5.83
68.3	68.7	32.39	10.23	24.88	

COASTAL ZONE OCEANOGRAPHY

CRUISE NO: 18   CODE   TAPE: U00454   -469
LAT N 48 45.39   LONG W 125 47.05
DATE 5/ 2/81   PASS NO. 33
TIME (PST) 1229   STN: A.P. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.0	4.0	31.19	9.09	24.13
4.8	4.9	31.20	9.09	24.13
9.9	10.0	31.20	9.07	24.13
15.0	15.0	31.25	9.09	24.17
19.9	20.0	31.35	9.16	24.23
24.9	25.0	31.39	8.93	24.31
29.9	30.1	31.47	9.11	24.34
34.8	34.9	31.49	9.07	24.36
39.9	40.1	31.53	9.08	24.39
44.9	45.1	31.54	9.09	24.40
49.8	50.0	31.54	9.10	24.40
59.7	60.0	31.60	9.25	24.42
65.5	65.8	31.71	9.52	24.46

CRUISE NO: 18   CODE   TAPE: U00454   -470
LAT N 48 49.32   LONG W 125 41.36
DATE 5/ 2/81   PASS NO. 35
TIME (PST) 1305   STN: A.P. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.7	3.7	30.62	8.46	23.77	
5.0	5.0	30.64	8.46	23.79	
10.0	10.0	30.63	8.47	23.78	
14.9	14.9	30.67	8.47	23.81	
19.8	19.9	30.74	8.52	23.86	
24.8	25.0	30.76	8.54	23.87	5.86
29.9	30.0	30.91	8.67	23.97	
34.9	35.0	31.06	8.72	24.08	
39.9	40.1	31.10	8.72	24.11	
44.8	45.0	31.16	8.82	24.14	
49.7	49.9	31.23	8.91	24.18	5.65
59.7	60.0	31.42	9.11	24.30	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 18   CODE
LAT N 48 53.19
DATE 5/ 2/81
TIME (PST) 1345

TAPE: UDD454   -471
LONG W 125 36.12
PASS NO. 37
STN: A.P. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.0	4.0	29.27	9.00	22.64
5.0	5.0	29.28	9.02	22.64
10.0	10.0	30.23	8.96	23.39
14.8	14.8	30.96	9.72	23.84
20.0	20.0	31.00	9.76	23.87
24.9	25.0	31.11	9.70	23.96
29.8	29.9	31.25	9.78	24.06
34.9	35.1	31.27	9.75	24.09
40.0	40.1	31.32	9.72	24.12
44.8	45.0	31.35	9.68	24.16
49.8	50.0	31.36	9.59	24.18
52.6	52.8	31.41	9.17	24.29

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19    CODE                              TAPE: U00454   -472
LAT  N 48 10.60                                    LONG W 125 56.20
DATE 10/ 3/81                                      PASS NO.  1
TIME (PST) 0830                                    STN: 110

 DEPTH      PRESS       SAL        TEMP    SIGMA-T
   4.5        4.5      32.46       9.92     24.99
   5.0        5.0      32.47       9.92     24.99
   9.9        9.9      32.47       9.92     24.99
  14.9       15.0      32.47       9.92     24.99
  19.9       20.0      32.47       9.92     25.00
  24.9       25.0      32.47       9.92     24.99
  29.6       29.8      32.48       9.92     25.00
  34.9       35.0      32.49       9.91     25.01
  39.7       40.0      32.48       9.90     25.01
  44.9       45.1      32.48       9.87     25.01
  49.7       50.0      32.48       9.87     25.01
  59.7       60.0      32.48       9.86     25.01
  69.6       70.0      32.48       9.86     25.01
  79.8       80.2      32.48       9.84     25.02
  90.3       90.9      32.55       9.54     25.11
  99.4      100.0      32.81       9.06     25.40
 110.3      110.9      33.17       8.56     25.76
 120.4      121.1      33.28       8.14     25.91
 130.2      131.0      33.36       7.96     25.99
 140.3      141.2      33.50       7.70     26.14
 150.2      151.2      33.63       7.60     26.26
 159.9      160.9      33.77       7.65     26.36
 170.0      171.1      33.88       7.74     26.44
 179.8      180.9      33.91       7.68     26.47
 189.9      191.1      33.94       7.55     26.51
 199.7      201.1      33.96       7.44     26.54
 224.6      226.1      33.98       7.24     26.58
 250.0      251.8      33.99       6.98     26.63
 275.1      277.0      34.01       6.71     26.68
 300.0      302.1      34.00       6.42     26.71
 324.9      327.2      34.01       6.11     26.76
 350.4      353.0      34.02       5.88     26.80
 375.2      378.0      34.00       5.44     26.83
 400.1      403.1      34.05       5.46     26.87
 424.8      428.1      34.05       5.28     26.89
 449.5      453.0      34.06       5.06     26.93
 475.2      478.9      34.08       5.04     26.94
 500.1      504.1      34.10       5.00     26.96
 501.8      505.8      34.09       5.00     26.96
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19   CODE
LAT N 48 12.90
DATE 10/ 3/81
TIME (PST) 0909

TAPE: U00454   -473
LONG W 125 52.00
PASS NO. 3
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
6.1	6.2	32.47	10.06	24.97
10.0	10.0	32.47	10.05	24.97
14.9	15.0	32.47	10.05	24.97
20.0	20.1	32.49	10.11	24.98
24.9	25.0	32.51	10.16	24.98
29.7	29.9	32.52	10.17	24.99
34.9	35.1	32.53	10.20	24.99
39.7	39.9	32.50	9.96	25.01
44.7	44.9	32.46	9.73	25.02
49.8	50.0	32.45	9.63	25.03
59.6	59.9	32.48	9.71	25.03
70.2	70.6	32.47	9.57	25.05
79.6	80.1	32.74	9.98	25.20
90.5	91.0	32.96	10.07	25.35
100.5	101.0	33.17	9.57	25.59
110.3	111.0	33.07	7.95	25.77
120.4	121.2	33.26	7.84	25.93
130.2	131.0	33.48	8.00	26.09
140.4	141.3	33.63	7.94	26.21
150.2	151.1	33.67	7.86	26.25
160.1	161.1	33.71	7.76	26.30
169.7	170.8	33.76	7.65	26.35
179.8	181.0	33.81	7.54	26.41
190.5	191.7	33.87	7.57	26.45
199.7	201.0	33.91	7.55	26.49
224.6	226.1	33.97	6.96	26.62
250.0	251.7	34.00	6.74	26.67
275.0	276.9	33.99	6.52	26.69
299.9	302.1	34.00	6.26	26.73
324.6	326.9	34.00	6.06	26.76
350.2	352.7	33.99	5.64	26.80
375.7	378.5	34.01	5.58	26.83
400.0	403.0	34.03	5.42	26.86
424.7	427.9	34.04	5.27	26.88
450.3	453.8	34.06	5.17	26.91
474.2	478.0	34.08	5.02	26.95
500.2	504.1	34.09	4.90	26.97
504.1	508.1	34.09	4.89	26.97

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19 CODE
LAT N 48 15.10
DATE 10/ 3/81
TIME (PST) 0950

TAPE: U00454 -474
LONG W 125 47.70
PASS NO. 5
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.8	4.8	32.43	10.21	24.91
5.0	5.0	32.43	10.21	24.91
9.9	10.0	32.43	10.21	24.91
15.0	15.1	32.44	10.19	24.93
19.9	20.0	32.49	10.05	24.99
24.9	25.0	32.47	9.88	25.00
29.7	29.8	32.49	9.91	25.01
34.7	34.9	32.49	9.90	25.01
40.4	40.7	32.48	9.86	25.01
44.7	45.0	32.49	9.86	25.02
49.8	50.0	32.46	9.60	25.04
59.5	59.9	32.58	9.95	25.07
69.8	70.2	32.73	10.06	25.17
79.6	80.1	32.90	10.06	25.31
90.0	90.5	33.02	9.99	25.41
99.6	100.2	33.17	9.68	25.58
110.3	111.0	33.34	9.26	25.78
120.0	120.7	33.43	8.87	25.92
130.7	131.5	33.53	8.68	26.02
140.1	141.0	33.69	8.44	26.18
150.0	150.9	33.74	8.15	26.26
159.9	160.9	33.76	8.08	26.29
169.8	170.9	33.81	7.96	26.35
179.8	181.0	33.82	7.80	26.38
189.7	191.0	33.84	7.67	26.42
199.7	201.0	33.85	7.61	26.43
207.8	209.2	33.85	7.61	26.43

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19 CODE
LAT N 48 18.60
DATE 10/ 3/81
TIME (PST) 1049

TAPE: U00454 -475
LONG W 125 41.20
PASS NO. 7
STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
5.0	5.1	32.24	10.17	24.77	
9.8	9.9	32.25	10.18	24.78	6.79
14.9	15.0	32.30	10.19	24.81	
20.0	20.1	32.34	10.11	24.86	
24.9	25.1	32.37	10.13	24.88	6.53
29.9	30.0	32.46	10.31	24.92	
34.6	34.8	32.52	10.36	24.95	
39.7	39.9	32.54	10.39	24.97	
44.7	44.9	32.56	10.40	24.98	
49.6	49.9	32.56	10.41	24.98	6.37
59.7	60.0	32.56	10.17	25.02	
69.6	70.0	32.55	10.11	25.03	
75.2	75.6	32.59	10.15	25.05	5.79
79.6	80.1	32.66	10.22	25.09	
89.6	90.1	32.80	10.20	25.20	
100.5	101.1	33.00	9.98	25.40	4.68
110.0	110.7	33.25	9.41	25.68	
120.3	121.0	33.70	8.11	26.24	
124.5	125.2	33.80	7.75	26.37	3.08
130.1	130.9	33.84	7.61	26.42	
140.1	141.0	33.86	7.51	26.45	2.90
150.0	150.9	33.88	7.36	26.49	
150.0	150.9	33.88	7.36	26.49	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19    CODE                             TAPE: U00454    -476
LAT  N 48 22.00                                   LONG W 125 34.70
DATE 10/ 3/81                                     PASS NO.  9
TIME (PST) 1217                                   STN: 106

 DEPTH       PRESS       SAL         TEMP      SIGMA-T
   4.1         4.1      32.26       10.20       24.78
   4.9         4.9      32.26       10.20       24.78
  10.0        10.0      32.27       10.20       24.79
  15.1        15.1      32.30       10.19       24.81
  19.9        20.0      32.31       10.19       24.82
  24.8        24.9      32.31       10.19       24.82
  29.7        29.9      32.32       10.19       24.83
  34.8        35.0      32.35       10.22       24.85
  39.9        40.1      32.40       10.28       24.88
  44.8        45.0      32.45       10.38       24.90
  49.6        49.9      32.49       10.42       24.92
  59.6        59.9      32.56       10.48       24.97
  69.7        70.1      32.60       10.41       25.02
  79.5        80.0      32.73       10.19       25.15
  90.4        90.9      32.92        9.91       25.34
 100.3       100.9      33.18        9.74       25.58
 109.6       110.2      33.43        8.98       25.90
 120.2       120.9      33.59        8.56       26.08
 130.3       131.1      33.72        8.10       26.25
 140.2       141.1      33.84        7.56       26.43
 143.1       144.0      33.85        7.55       26.44
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19 CODE
LAT N 48 25.50
DATE 10/ 3/81
TIME (PST) 1302

TAPE: U00454 -477
LONG W 125 28.30
PASS NO. 11
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.5	4.6	32.00	10.10	24.60	
5.1	5.2	32.00	10.10	24.60	
9.9	9.9	32.04	10.10	24.62	6.81
14.9	15.0	32.07	10.08	24.65	
19.8	19.9	32.16	10.15	24.72	
24.8	25.0	32.35	10.38	24.83	6.37
30.0	30.1	32.42	10.44	24.87	
34.8	35.0	32.47	10.45	24.91	
39.8	40.0	32.53	10.42	24.96	
44.7	44.9	32.54	10.42	24.96	
49.6	49.9	32.55	10.42	24.97	6.30
59.7	60.0	32.58	10.42	24.99	
69.6	70.0	32.59	10.39	25.00	
74.5	74.9	32.63	10.28	25.05	6.09
79.7	80.1	32.69	10.23	25.11	
90.2	90.7	32.78	10.10	25.21	
99.6	100.2	33.11	9.84	25.50	4.84
110.5	111.1	33.35	9.08	25.81	
120.1	120.8	33.59	8.42	26.10	
125.3	126.1	33.63	8.27	26.16	3.1
130.4	131.2	33.70	8.06	26.25	
133.3	134.1	33.76	7.88	26.32	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19   CODE
LAT N 48 28.90
DATE 10/ 3/81
TIME (PST) 1407

TAPE: U00454   -470
LONG W 125 21.80
PASS NO. 13
STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.2	3.2	31.55	9.33	24.37
5.1	5.1	31.54	9.32	24.37
10.0	10.1	31.55	9.31	24.37
15.2	15.2	31.60	9.10	24.44
20.0	20.1	31.61	9.25	24.43
25.0	25.1	31.66	9.34	24.45
29.9	30.0	31.79	9.46	24.54
34.8	34.9	31.81	9.17	24.60
39.8	40.0	31.89	9.10	24.67
45.1	45.4	32.06	9.71	24.71
49.8	50.0	32.34	10.34	24.82
59.7	60.0	32.58	10.32	25.01
69.7	70.1	32.64	10.30	25.06
80.4	80.8	32.80	10.09	25.23
89.7	90.2	32.95	9.84	25.38
100.3	100.9	33.17	9.44	25.62
110.4	111.0	33.41	8.96	25.88
120.3	121.0	33.56	8.53	26.07
130.3	131.1	33.75	7.91	26.31
140.1	140.9	33.75	7.89	26.31
147.1	148.0	33.75	7.89	26.31

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19   CODE   TAPE: U00454   -479
LAT N 48 32.20   LONG W 125 15.50
DATE 10/ 3/81   PASS NO. 15
TIME (PST) 1455   STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.5	3.6	31.47	8.99	24.36	
5.1	5.1	31.47	8.98	24.36	
10.0	10.1	31.50	8.90	24.40	6.25
14.9	14.9	31.56	9.00	24.42	
19.9	20.0	31.65	9.08	24.49	
24.8	24.9	31.69	9.16	24.50	6.30
30.0	30.1	31.84	9.33	24.59	
34.8	35.0	31.84	9.30	24.60	
39.6	39.8	31.90	9.07	24.68	
44.7	45.0	32.04	9.02	24.80	
49.5	49.8	32.18	9.12	24.89	5.15
59.7	60.0	32.42	9.37	25.04	
69.7	70.1	32.79	9.90	25.24	
74.6	75.0	32.85	9.77	25.31	4.95
79.6	80.0	32.99	9.60	25.45	
90.5	91.0	33.32	8.87	25.82	
99.6	100.1	33.53	8.33	26.07	3.70
106.1	106.7	33.58	8.23	26.12	

CRUISE NO: 19   CODE   TAPE: U00454   -480
LAT N 48 35.60   LONG W 125 9.00
DATE 10/ 3/81   PASS NO. 17
TIME (PST) 1552   STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.8	3.9	31.19	10.02	23.97
5.1	5.1	31.20	9.98	23.99
10.4	10.4	31.42	9.74	24.20
14.9	15.0	31.47	9.63	24.26
20.0	20.1	31.50	9.53	24.30
24.7	24.9	31.56	9.43	24.36
29.9	30.0	31.72	9.31	24.50
35.0	35.1	31.97	9.47	24.68
39.9	40.0	32.11	9.66	24.75
44.7	45.0	32.29	9.87	24.86
49.9	50.1	32.38	10.06	24.90
59.7	60.0	32.61	10.24	25.05
69.5	69.9	32.61	10.07	25.08
79.6	80.0	32.68	9.97	25.15
89.5	90.0	32.84	9.86	25.29
100.4	100.9	33.05	9.27	25.55
109.9	110.5	33.29	8.96	25.79
114.5	115.1	33.38	8.79	25.88

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 19   CODE   TAPE: U00454   -481
LAT   N 48 39.00   LONG W 125 2.50
DATE 10/ 3/81   PASS NO. 19
TIME (PST) 1635   STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.1	4.1	30.72	8.86	23.79	
5.0	5.0	30.76	8.68	23.85	
10.1	10.1	30.86	8.68	23.93	6.17
15.0	15.1	30.92	8.71	23.97	
20.0	20.1	31.05	8.83	24.05	
25.0	25.1	31.06	8.79	24.07	6.03
29.8	30.0	31.07	8.77	24.08	
34.7	34.9	31.06	8.75	24.07	
39.9	40.1	31.06	8.71	24.08	
44.9	45.1	31.07	8.72	24.08	5.97
49.7	50.0	31.16	8.77	24.15	
53.4	53.7	31.24	8.78	24.21	

CRUISE NO: 20   CODE   TAPE: U00454   -482
LAT   N 48 13.21   LONG W 124 56.37
DATE 21/ 4/81   PASS NO. 1
TIME (PST) 1208   STN: C.A.11

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.2	4.2	30.23	10.06	23.22
5.0	5.0	30.23	10.06	23.22
9.9	9.9	30.24	10.04	23.23
15.0	15.0	31.14	9.33	24.05
19.9	20.0	31.65	8.88	24.52
24.9	25.0	31.75	8.97	24.58
29.9	30.0	32.13	9.54	24.79
35.0	35.2	32.45	9.54	25.04
39.8	40.0	32.57	8.86	25.24
44.6	44.8	32.87	9.10	25.44
49.8	50.1	33.04	8.81	25.61
59.8	60.1	33.14	8.72	25.71
69.6	70.0	33.44	7.98	26.05
80.3	80.8	33.65	7.58	26.27
90.5	91.0	33.83	7.29	26.46
100.4	101.0	33.84	7.25	26.47
110.2	110.9	33.86	7.14	26.50
120.2	121.0	33.86	7.12	26.50
130.1	130.9	33.88	7.03	26.54
140.3	141.2	33.89	7.03	26.54
150.0	151.0	33.89	7.02	26.54

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20   CODE
LAT N 48 12.51
DATE 21/ 4/81
TIME (PST) 1250

TAPE: U00454   -483
LONG W 125 2.25
PASS NO. 3
STN: C.A.10

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.7	4.7	30.76	10.19	23.62	
5.0	5.1	30.79	10.15	23.65	
10.0	10.0	31.19	9.84	24.01	7.00
14.9	15.0	31.44	9.73	24.22	
20.0	20.1	31.82	9.69	24.53	
25.0	25.1	32.17	9.72	24.79	6.76
29.9	30.0	32.35	9.68	24.94	
35.0	35.2	32.45	9.68	25.01	
39.8	40.0	32.51	9.61	25.07	
44.8	45.1	32.59	9.51	25.15	
49.7	49.9	32.68	9.41	25.24	5.84
59.7	60.0	32.87	9.21	25.42	
69.7	70.1	33.06	8.88	25.62	
75.4	75.9	33.30	8.46	25.87	5.67
79.4	79.9	33.35	8.34	25.93	
89.7	90.2	33.44	8.16	26.03	
100.4	101.0	33.60	7.84	26.20	5.37
110.5	111.2	33.68	7.54	26.31	
120.3	121.0	33.74	7.34	26.38	
125.4	126.2	33.79	7.21	26.44	4.03
130.0	130.8	33.82	7.13	26.47	
140.1	141.0	33.85	6.94	26.53	
150.0	151.0	33.87	6.86	26.55	3.13
160.0	161.1	33.89	6.80	26.57	
170.0	171.1	33.90	6.75	26.59	
179.8	181.0	33.94	6.57	26.65	
189.9	191.2	33.95	6.29	26.69	
199.6	201.0	33.96	6.18	26.71	2.71
201.8	203.2	33.97	6.15	26.72	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE TAPE: U00454 -484
LAT N 48 12.24 LONG W 125 8.11
DATE 21/ 4/81 PASS NO. 5
TIME (PST) 1420 STN: C.A. 9

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.2	4.2	30.56	10.34	23.44
5.0	5.0	30.56	10.33	23.44
10.1	10.2	31.00	10.14	23.81
15.0	15.1	31.37	10.03	24.12
19.7	19.8	31.43	9.99	24.17
25.0	25.1	31.63	9.86	24.35
29.7	29.9	32.20	9.65	24.82
34.8	35.0	32.26	9.64	24.88
39.8	40.0	32.42	9.66	25.00
44.8	45.0	32.54	9.55	25.11
49.8	50.0	32.66	9.38	25.22
59.9	60.2	32.87	9.14	25.43
69.7	70.0	33.11	8.78	25.68
79.6	80.0	33.36	8.30	25.94
89.6	90.1	33.53	8.00	26.13
100.4	101.0	33.57	7.93	26.17
110.3	110.9	33.74	7.49	26.36
114.4	115.1	33.75	7.45	26.37

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE
TAPE: U00454 -485
LAT N 48 12.41
LONG W 125 13.55
DATE 21/ 4/81
PASS NO. 7
TIME (PST) 1502
STN: C.A. 8

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.7	3.7	31.37	10.50	24.04
4.9	4.9	31.46	10.48	24.11
9.9	10.0	31.47	10.30	24.15
15.0	15.0	31.47	10.15	24.17
19.8	19.9	31.48	10.15	24.18
24.9	25.0	31.57	10.02	24.28
29.9	30.0	31.81	9.73	24.51
34.8	35.0	31.95	9.68	24.62
39.8	40.0	32.14	9.64	24.78
44.8	45.0	32.27	9.62	24.88
49.7	49.9	32.44	9.62	25.02
59.6	59.9	32.76	9.28	25.32
69.7	70.0	33.16	8.67	25.73
79.6	80.1	33.30	8.37	25.89
89.5	90.1	33.42	8.15	26.01
100.6	101.1	33.55	7.95	26.15
109.6	110.3	33.62	7.81	26.22
120.1	120.9	33.71	7.54	26.33
130.0	130.8	33.77	7.43	26.40
132.3	133.1	33.82	7.26	26.45

CRUISE NO: 20 CODE
TAPE: U00454 -486
LAT N 48 11.37
LONG W 125 19.38
DATE 21/ 4/81
PASS NO. 9
TIME (PST) 1547
STN: C.A. 7

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.1	4.1	31.41	10.22	24.11
4.6	4.6	31.40	10.22	24.11
9.9	10.0	31.43	10.08	24.16
14.9	14.9	31.43	10.04	24.16
20.0	20.0	31.73	9.79	24.44
24.8	24.9	32.06	9.55	24.73
29.9	30.0	32.16	9.52	24.81
34.7	34.9	32.31	9.57	24.93
39.9	40.1	32.49	9.52	25.07
44.8	45.0	32.60	9.46	25.17
49.7	50.0	32.71	9.34	25.27
59.7	60.1	32.87	9.16	25.43
69.6	70.0	33.08	8.84	25.64
79.6	80.0	33.27	8.43	25.86
87.6	88.1	33.34	8.28	25.93

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20    CODE                              TAPE: U00454    -487
LAT  N 48 11.16                                    LONG W 125 25.19
DATE 21/ 4/81                                      PASS NO. 11
TIME (PST) 1625                                    STN: C.A. 6

 DEPTH     PRESS       SAL        TEMP     SIGMA-T   OXYGEN
   3.7       3.7     30.63       10.02     23.54
   4.9       4.9     31.24       10.03     24.02
  10.0      10.1     31.28        9.96     24.05     8.06
  14.8      14.9     31.59        9.32     24.40
  19.9      20.0     31.90        9.19     24.67
  24.9      25.0     32.26        9.64     24.87     5.32
  29.7      29.9     32.37        9.62     24.97
  34.8      35.0     32.46        9.60     25.04
  39.8      40.0     32.56        9.52     25.13
  44.6      44.8     32.67        9.40     25.23
  49.9      50.2     32.67        9.39     25.24     4.81
  59.8      60.1     32.82        9.20     25.38
  69.7      70.1     32.90        9.09     25.47
  74.6      75.0     33.15        8.66     25.73     3.69
  79.6      80.0     33.24        8.55     25.81
  90.3      90.9     33.49        8.08     26.08
 100.5     101.1     33.71        7.56     26.33     3.06
 110.4     111.1     33.72        7.53     26.34
 117.1     117.8     33.72        7.53     26.34

CRUISE NO:  20   CODE                              TAPE: U00454   -488
LAT  N 48 10.57                                    LONG W 125 30.58
DATE 21/ 4/81                                      PASS NO. 13
TIME (PST) 1723                                    STN: C.A. 5

 DEPTH     PRESS       SAL        TEMP     SIGMA-T
   2.9       3.0     31.10        9.98     23.91
   5.5       5.5     31.11       10.01     23.92
  10.0      10.1     31.13        9.98     23.93
  15.1      15.1     31.19        9.69     24.03
  20.0      20.1     31.37        9.40     24.22
  24.7      24.8     31.54        9.04     24.41
  30.0      30.1     31.75        8.81     24.60
  35.0      35.1     32.04        9.18     24.78
  39.9      40.1     32.32        9.61     24.92
  44.9      45.1     32.38        9.63     24.97
  49.9      50.1     32.44        9.58     25.02
  59.7      60.0     32.54        9.29     25.15
  69.6      69.9     32.67        9.06     25.29
  80.5      80.9     32.99        8.96     25.56
  90.5      91.0     33.17        8.81     25.72
  99.6     100.1     33.30        8.60     25.85
 110.5     111.2     33.50        8.07     26.09
 119.2     119.9     33.75        7.55     26.36
 130.1     130.9     33.87        7.29     26.49
 140.3     141.1     33.91        7.07     26.55
 140.9     141.8     33.91        7.06     26.56
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE
LAT N 48 10.26
DATE 21/ 4/81
TIME (PST) 1843

TAPE: U00454 -490
LONG W 125 42.11
PASS NO. 17
STN: C.A. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.8	3.8	31.40	10.19	24.11
5.0	5.0	31.40	10.19	24.11
10.0	10.0	31.40	10.19	24.11
15.1	15.1	31.69	9.79	24.41
20.0	20.1	31.98	9.52	24.68
25.1	25.2	32.13	9.53	24.79
29.8	29.9	32.29	9.64	24.90
34.9	35.0	32.39	9.75	24.96
39.9	40.1	32.43	9.54	25.02
44.9	45.1	32.41	9.48	25.02
49.8	50.1	32.41	9.47	25.02
59.6	59.9	32.42	9.47	25.03
69.7	70.1	32.48	9.41	25.08
80.3	80.7	32.76	9.23	25.33
89.5	90.0	32.99	9.08	25.54
100.4	100.9	33.40	8.22	25.99
110.4	111.0	33.53	7.62	26.18
120.3	121.0	33.59	7.46	26.25
130.1	130.9	33.70	7.39	26.35
140.2	141.0	33.75	7.33	26.39
150.1	151.0	33.84	7.27	26.47
159.9	160.9	33.88	7.15	26.52
170.0	171.0	33.89	7.05	26.54
179.9	181.0	33.93	6.90	26.59
189.8	191.0	33.95	6.68	26.64
199.6	200.9	33.98	6.45	26.69
225.5	227.1	33.99	6.08	26.75
250.4	252.1	34.01	5.78	26.80
275.1	277.1	34.02	5.61	26.83
300.0	302.2	34.03	5.48	26.85
324.4	326.7	34.05	5.31	26.89

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20   CODE
LAT N 48 10.40
DATE 21/ 4/81
TIME (PST) 1805

TAPE: U00454   -489
LONG W 125 36.35
PASS NO. 15
STN: C.A. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.5	4.5	31.73	10.37	24.34
5.0	5.0	31.73	10.37	24.34
9.9	10.0	31.94	10.18	24.54
15.0	15.1	31.98	9.96	24.60
19.9	20.0	32.03	9.89	24.66
24.8	24.9	32.14	9.72	24.77
29.8	30.0	32.27	9.71	24.87
34.9	35.0	32.31	9.66	24.91
40.0	40.2	32.37	9.65	24.96
44.6	44.9	32.39	9.63	24.98
49.8	50.0	32.44	9.67	25.01
59.7	60.1	32.49	9.44	25.09
70.1	70.5	32.58	9.38	25.16
80.6	81.1	32.77	9.26	25.34
89.7	90.2	33.17	8.76	25.73
100.4	101.0	33.33	8.52	25.89
110.2	110.9	33.39	8.41	25.95
120.3	121.1	33.42	8.33	25.98
130.2	131.0	33.48	8.05	26.08
140.3	141.1	33.81	7.38	26.43
150.2	151.2	33.88	7.19	26.51
159.7	160.7	33.91	7.02	26.56
164.9	165.9	33.92	7.02	26.56

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE TAPE: U00454 -491
LAT N 48 10.13 LONG W 125 47.46
DATE 21/ 4/81 PASS NO. 19
TIME (PST) 1933 STN: C.A. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
3.6	3.6	31.88	10.10	24.51	
4.9	4.9	31.88	10.10	24.51	
10.0	10.0	31.89	10.10	24.51	
15.0	15.1	31.93	10.06	24.55	
20.0	20.1	32.04	9.96	24.65	
24.8	24.9	32.07	9.87	24.69	6.82
29.9	30.1	32.19	9.76	24.80	
34.7	34.9	32.36	9.74	24.94	
39.8	40.1	32.46	9.91	24.99	
44.7	44.9	32.47	9.89	25.00	
50.4	50.6	32.47	9.87	25.00	6.66
59.6	59.9	32.46	9.69	25.02	
69.7	70.1	32.53	9.22	25.15	
74.7	75.1	32.79	9.19	25.36	4.58
79.5	79.9	33.02	8.61	25.63	
89.6	90.1	33.13	8.25	25.77	
100.5	101.0	33.38	7.69	26.05	5.15
110.5	111.1	33.51	7.63	26.16	
120.3	121.0	33.60	7.49	26.25	
125.2	126.0	33.63	7.41	26.28	3.97
130.2	131.0	33.66	7.37	26.31	
140.1	141.0	33.76	7.29	26.40	
150.0	151.0	33.80	7.26	26.44	
159.9	160.9	33.86	7.16	26.50	
169.9	171.0	33.90	7.04	26.55	
179.7	180.8	33.93	6.88	26.60	
189.6	190.9	33.95	6.80	26.62	
199.7	201.0	33.97	6.62	26.66	2.80
225.5	227.0	33.99	6.23	26.73	
250.5	252.2	33.99	5.97	26.76	2.03
274.8	276.8	34.00	5.74	26.80	
299.7	301.8	34.01	5.63	26.82	1.64
325.5	327.9	34.03	5.47	26.85	
349.9	352.5	34.03	5.37	26.87	
375.2	378.0	34.06	5.19	26.91	
399.9	403.0	34.07	4.97	26.94	
424.7	428.0	34.09	4.90	26.96	
450.1	453.6	34.11	4.74	27.00	
474.4	478.2	34.13	4.68	27.02	
500.0	504.0	34.15	4.62	27.04	
509.9	514.0	34.15	4.60	27.05	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE
LAT N 48 12.90
DATE 21/ 6/81
TIME (PST) 2135

TAPE: U00454 -492
LONG W 125 52.00
PASS NO. 21
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.0	4.0	32.00	9.98	24.61
5.1	5.1	31.99	9.99	24.61
9.8	9.9	32.01	9.95	24.63
14.9	15.0	32.04	9.86	24.67
19.8	19.9	32.04	9.85	24.67
24.8	25.0	32.08	9.81	24.70
29.6	29.8	32.21	9.58	24.84
34.8	35.0	32.33	9.51	24.95
39.7	39.9	32.41	9.50	25.01
44.7	44.9	32.47	9.43	25.07
49.7	49.9	32.48	9.34	25.10
60.2	60.5	32.60	9.26	25.20
70.1	70.5	32.83	9.12	25.40
79.6	80.1	33.10	8.85	25.66
90.5	91.0	33.35	8.31	25.94
100.5	101.1	33.46	8.11	26.05
110.4	111.1	33.55	7.71	26.18
120.3	121.0	33.62	7.49	26.27
130.2	131.0	33.76	7.33	26.40
140.3	141.2	33.85	7.19	26.49
150.0	151.0	33.86	7.15	26.50
160.1	161.1	33.89	7.09	26.53
169.8	170.9	33.91	7.00	26.57
179.9	181.1	33.94	6.87	26.60
189.8	191.0	33.96	6.74	26.63
199.7	201.0	33.95	6.62	26.64
225.3	226.8	33.98	6.39	26.70
250.2	252.0	33.99	6.23	26.73
275.1	277.1	34.00	6.11	26.75
300.4	302.6	34.00	5.78	26.79
325.5	327.9	34.02	5.56	26.83
350.5	353.1	34.03	5.44	26.86
375.1	378.0	34.06	5.22	26.90
399.9	403.0	34.08	5.00	26.94
425.3	428.6	34.10	4.81	26.99
450.0	453.5	34.11	4.74	27.00
475.1	478.9	34.14	4.64	27.03
494.0	498.0	34.14	4.63	27.04

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE
LAT N 48 15.10
DATE 21/ 4/81
TIME (PST) 2218

TAPE: U00454 -493
LONG W 125 47.70
PASS NO. 23
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.0	3.0	5.92	9.90	4.34
5.1	5.0	31.92	9.90	24.56
9.9	9.9	31.92	9.89	24.57
15.1	15.1	31.98	9.89	24.62
20.6	20.6	32.05	9.85	24.68
25.0	25.1	32.19	9.54	24.84
30.0	30.1	32.28	9.47	24.91
34.9	35.0	32.37	9.52	24.98
39.9	40.1	32.42	9.47	25.03
45.0	45.2	32.48	9.38	25.09
49.9	50.1	32.47	9.18	25.11
60.4	60.6	32.48	8.93	25.15
69.8	70.1	32.73	9.19	25.31
79.7	80.0	32.77	9.18	25.34
90.5	91.0	33.23	8.68	25.78
99.6	100.1	33.42	8.27	25.99
109.6	110.2	33.66	7.84	26.25
120.5	121.1	33.77	7.60	26.37
130.2	131.0	33.83	7.34	26.45
140.2	141.0	33.86	7.24	26.49
150.1	151.0	33.88	7.09	26.53
160.0	160.9	33.91	6.98	26.57
169.9	171.0	33.92	6.92	26.58
180.5	181.6	33.94	6.79	26.61
189.7	190.9	33.96	6.64	26.65
199.8	201.1	33.97	6.51	26.67
206.4	207.7	33.97	6.43	26.69

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20   CODE                     TAPE: U00454    -494
LAT  N 48 18.60                          LONG W 125 41.20
DATE 21/ 4/81                            PASS NO. 25
TIME (PST) 2309                          STN: 107

 DEPTH      PRESS      SAL       TEMP     SIGMA-T    OXYGEN
   4.3        4.3     31.83     10.00     24.48
   4.9        4.9     31.83     10.00     24.48
  10.0       10.0     31.83     10.01     24.48     6.92
  14.9       15.0     31.86      9.97     24.51
  20.1       20.2     32.09      9.71     24.73
  24.9       25.0     32.17      9.57     24.81     6.89
  29.7       29.8     32.24      9.53     24.88
  34.6       34.8     32.33      9.53     24.94
  39.7       39.9     32.38      9.53     24.99
  44.8       45.1     32.44      9.53     25.03
  49.7       50.0     32.46      9.47     25.06     6.31
  60.4       60.7     32.52      9.38     25.12
  69.5       69.9     32.58      9.36     25.17
  74.7       75.1     32.65      9.29     25.23     5.89
  79.6       80.0     32.74      9.17     25.33
  90.4       90.9     33.08      8.77     25.65
 100.2      100.7     33.31      8.52     25.87     3.67
 110.3      110.9     33.55      7.95     26.14
 119.3      120.0     33.70      7.60     26.31
 125.2      125.9     33.76      7.44     26.39     2.69
 130.3      131.1     33.85      7.22     26.48
 140.2      141.1     33.93      6.87     26.60
 149.9      150.9     33.93      6.78     26.61
 153.9      154.9     33.93      6.78     26.61
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE
LAT N 48 22.00
DATE 22/ 4/81
TIME (PST) 0021

TAPE: U00454 -495
LONG W 125 34.70
PASS NO. 27
STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
6.8	6.9	31.34	10.08	24.08
10.1	10.1	31.34	10.08	24.08
14.7	14.8	31.37	10.02	24.12
20.1	20.2	31.50	9.73	24.27
24.8	24.9	31.72	9.46	24.48
29.9	30.0	32.03	9.43	24.73
34.8	34.9	32.28	9.58	24.90
39.8	40.0	32.37	9.57	24.97
44.8	45.1	32.42	9.57	25.01
49.8	50.1	32.44	9.45	25.05
59.6	59.9	32.54	9.09	25.18
69.8	70.1	32.71	9.20	25.30
80.4	80.9	32.81	9.12	25.39
89.5	90.0	33.21	8.65	25.77
100.5	101.1	33.59	7.94	26.17
110.4	111.0	33.81	7.36	26.43
120.4	121.1	33.93	6.73	26.62
122.9	123.7	33.94	6.63	26.64

CRUISE NO: 20 CODE
LAT N 48 25.50
DATE 22/ 4/81
TIME (PST) 0106

TAPE: U00454 -496
LONG W 125 28.30
PASS NO. 29
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
2.2	2.2	30.65	10.13	23.54	
5.1	5.1	30.67	10.20	23.54	
9.9	9.9	30.68	10.20	23.55	7.76
14.9	15.0	31.17	9.99	23.97	
19.9	20.0	31.48	9.42	24.30	
24.8	25.0	31.61	9.15	24.44	6.02
29.9	30.0	31.76	8.94	24.59	
35.0	35.1	31.83	8.81	24.67	
39.8	40.0	32.08	8.70	24.88	
44.7	45.0	32.34	8.73	25.08	
49.8	50.0	32.40	8.74	25.13	4.49
59.8	60.1	32.68	8.67	25.35	
69.8	70.2	33.04	8.89	25.60	
74.6	75.0	33.08	8.85	25.64	3.72
80.5	80.9	33.20	8.74	25.75	
89.6	90.1	33.30	8.39	25.89	
100.5	101.1	33.64	7.75	26.24	3.01
110.3	110.9	33.82	7.24	26.46	
120.3	121.0	33.82	7.23	26.46	
125.3	126.1	33.83	7.21	26.47	2.43
128.0	128.8	33.83	7.20	26.48	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE TAPE: U00454 -497
LAT N 48 28.90 LONG W 125 21.80
DATE 22/ 4/81 PASS NO. 31
TIME (PST) 0220 STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
3.8	3.8	31.24	10.03	24.01
5.1	5.1	31.23	10.04	24.01
10.0	10.1	31.25	10.04	24.02
15.0	15.1	31.28	10.07	24.04
19.7	19.8	31.29	10.08	24.05
25.0	25.1	31.29	10.07	24.05
29.8	30.0	31.29	10.07	24.05
34.8	35.0	31.29	10.06	24.05
39.8	40.0	31.30	10.00	24.06
44.8	45.0	31.77	9.69	24.48
49.8	50.1	32.01	9.67	24.68
59.7	60.0	32.43	9.57	25.02
69.5	69.9	32.60	9.23	25.20
80.3	80.8	33.01	8.90	25.58
90.4	90.9	33.38	8.27	25.96
100.5	101.1	33.60	7.80	26.21
110.3	111.0	33.83	7.22	26.47
120.3	121.0	33.84	7.20	26.48
130.2	131.0	33.89	7.06	26.54
140.2	141.0	33.89	7.05	26.54
149.1	150.0	33.89	7.05	26.54

CRUISE NO: 20 CODE TAPE: U00454 -498
LAT N 48 32.20 LONG W 125 15.50
DATE 22/ 4/81 PASS NO. 33
TIME (PST) 0300 STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.1	4.1	30.15	9.92	23.19	
4.5	4.5	30.16	9.92	23.19	
10.1	10.1	30.23	9.85	23.25	7.42
15.0	15.0	30.48	9.60	23.49	
19.9	20.0	30.67	9.57	23.64	
24.9	25.0	30.97	9.77	23.85	6.69
29.9	30.0	31.25	9.60	24.09	
34.7	34.9	31.57	9.34	24.38	
39.9	40.1	31.98	8.57	24.82	
44.6	44.8	31.97	8.53	24.82	
50.3	50.5	32.05	8.47	24.89	4.65
59.8	60.1	32.26	8.41	25.06	
70.5	70.8	32.64	8.35	25.37	
74.5	74.9	32.86	8.37	25.54	3.66
79.5	79.9	33.13	8.24	25.77	
90.5	91.0	33.27	8.22	25.88	
99.5	100.1	33.54	7.90	26.14	2.64
105.2	105.8	33.63	7.63	26.25	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 20 CODE
LAT N 48 35.60
DATE 22/ 4/81
TIME (PST) 0351

TAPE: U00454 -499
LONG W 125 9.00
PASS NO. 34
STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
4.0	4.0	29.87	10.13	22.93
5.1	5.1	29.90	10.10	22.96
9.9	10.0	29.95	10.04	23.00
15.0	15.0	30.23	9.77	23.27
19.9	20.0	30.97	9.15	23.95
24.9	25.0	31.33	8.97	24.25
29.9	30.1	31.55	8.72	24.46
34.8	35.0	31.60	8.67	24.51
39.9	40.1	31.70	8.70	24.58
44.7	44.9	31.77	8.72	24.63
49.7	49.9	31.87	8.72	24.71
59.7	60.0	32.18	8.55	24.98
70.2	70.6	32.59	8.31	25.34
79.5	79.9	33.15	8.32	25.77
89.5	90.0	33.53	7.86	26.14
100.4	101.0	33.57	7.81	26.18
104.3	104.9	33.57	7.76	26.19

CRUISE NO: 20 CODE
LAT N 48 39.00
DATE 22/ 4/81
TIME (PST) 0432

TAPE: U00454 -500
LONG W 125 2.50
PASS NO. 36
STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
4.0	4.0	30.08	9.86	23.14	
4.9	5.0	30.08	9.86	23.14	
10.0	10.0	30.09	9.86	23.14	7.17
15.0	15.0	30.23	9.77	23.27	
20.0	20.1	31.27	9.09	24.19	
25.0	25.1	31.39	8.88	24.31	6.88
29.7	29.8	31.42	8.84	24.34	
34.9	35.0	31.59	8.68	24.50	
39.9	40.0	31.64	8.66	24.54	
44.8	45.0	31.71	8.60	24.61	
49.9	50.1	31.75	8.58	24.64	5.37
55.7	56.0	31.75	8.58	24.64	

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22   CODE                           TAPE: U00454   -612
LAT  N 50 23.40                                LONG W 128  7.50
DATE  5/ 9/81                                  PASS NO.  1
TIME (PST) 0700                                STN: K.I. 1

  DEPTH     PRESS       SAL       TEMP    SIGMA-T
     .0        .0     31.71      13.53     23.74
    2.1       2.1     31.70      13.59     23.73
    4.9       4.9     31.72      13.38     23.78
    9.9      10.0     31.74      13.33     23.81
   14.9      15.0     31.78      13.23     23.86
   19.8      19.9     31.79      12.86     23.94
   25.0      25.1     31.80      12.64     23.99
   30.0      30.1     31.86      12.54     24.05
   34.9      35.0     31.90      12.57     24.08
   39.8      40.0     31.96      12.34     24.17
   44.7      44.9     32.00      12.11     24.24
   49.8      50.0     32.14      11.60     24.44
   59.7      60.0     32.45      10.12     24.94
   69.8      70.2     32.62       9.32     25.21
   79.7      80.1     33.29       7.72     25.97
   87.4      87.9     33.46       7.47     26.14

CRUISE NO:  22   CODE                          TAPE: U00454   -613
LAT  N 50 20.00                                LONG W 128 13.80
DATE  5/ 9/81                                  PASS NO.  3
TIME (PST) 0742                                STN: K.I. 2

  DEPTH     PRESS       SAL       TEMP    SIGMA-T
     .5        .5     31.50      14.04     23.48
    2.0       2.0     31.51      14.01     23.49
    5.0       5.0     31.62      13.82     23.61
   10.1      10.1     31.67      13.37     23.74
   14.9      15.0     31.65      13.16     23.77
   20.0      20.1     31.71      13.16     23.82
   24.9      25.0     31.82      13.31     23.87
   29.9      30.0     31.86      12.94     23.98
   34.8      35.0     32.04      12.35     24.23
   39.7      39.9     32.42      10.94     24.78
   44.8      45.0     32.65       9.81     25.15
   49.9      50.1     32.84       8.82     25.45
   59.7      60.0     33.04       8.17     25.72
   69.7      70.0     33.22       7.83     25.90
   79.5      80.0     33.36       7.58     26.05
   89.5      90.0     33.52       7.31     26.21
  100.4     101.0     33.62       7.18     26.31
  110.4     111.1     33.71       7.11     26.39
  120.3     121.0     33.76       7.03     26.44
  130.3     131.1     33.84       6.92     26.52
  140.1     141.0     33.89       6.82     26.57
  150.0     151.0     33.92       6.58     26.63
  160.0     161.0     33.92       6.57     26.63
  165.8     166.9     33.92       6.55     26.63
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 50 16.30
DATE 5/ 9/81
TIME (PST) 0831

TAPE: U00454 -614
LONG W 128 20.50
PASS NO. 5
STN: K.I. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
2.0	2.0	31.69	14.76	23.48
5.1	5.1	31.70	14.69	23.50
10.0	10.0	31.90	13.91	23.81
14.9	14.9	31.95	13.50	23.93
20.0	20.0	32.06	12.73	24.17
24.9	25.0	32.22	12.09	24.41
29.8	29.9	32.51	10.69	24.89
34.8	35.0	32.67	10.16	25.11
39.8	40.0	32.89	9.31	25.42
44.8	45.0	33.07	8.51	25.68
49.7	50.0	33.15	8.21	25.79
59.4	59.7	33.30	7.74	25.98
69.6	70.0	33.37	7.53	26.06
79.6	80.0	33.52	7.19	26.23
90.5	91.1	33.63	7.02	26.34
100.5	101.1	33.69	6.95	26.39
110.3	111.0	33.74	6.89	26.44
120.3	121.0	33.78	6.83	26.48
130.1	130.9	33.81	6.80	26.51
140.2	141.1	33.82	6.73	26.53
150.0	151.0	33.84	6.62	26.56
159.9	160.9	33.87	6.51	26.59
169.9	171.1	33.88	6.51	26.60
179.7	180.9	33.90	6.41	26.63
189.6	190.9	33.91	6.33	26.65
199.6	200.9	33.92	6.24	26.67
225.3	226.9	33.96	6.18	26.71
250.2	252.0	33.95	5.90	26.74
274.9	276.9	33.98	5.88	26.76
299.7	301.9	34.00	5.70	26.80
324.5	326.9	34.02	5.48	26.84
350.3	353.0	34.03	5.33	26.87
375.1	377.9	34.02	5.14	26.88
399.9	403.0	34.01	4.90	26.90
424.7	428.0	34.05	5.05	26.92
450.4	454.0	34.05	4.83	26.94
475.0	478.9	34.05	4.69	26.96
496.9	500.9	34.07	4.65	26.98

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 50 12.60
DATE 5/ 9/81
TIME (PST) 0939

TAPE: U00454 -615
LONG W 128 27.00
PASS NO. 7
STN: K.I. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	31.58	15.72	23.19
2.0	2.0	31.58	15.72	23.18
4.9	4.9	31.58	15.72	23.19
10.0	10.0	31.58	15.71	23.19
15.0	15.1	31.61	15.25	23.31
19.9	20.0	32.26	11.20	24.61
24.8	24.9	32.26	10.44	24.74
29.8	29.9	32.35	9.83	24.91
34.9	35.1	32.45	9.11	25.10
39.9	40.0	32.52	8.81	25.21
44.7	44.9	32.58	8.65	25.28
49.8	50.0	32.65	8.49	25.36
59.6	59.9	32.84	8.14	25.56
69.6	69.9	33.09	7.69	25.82
79.6	80.1	33.15	7.62	25.88
90.5	91.0	33.42	7.41	26.12
100.4	101.0	33.55	7.22	26.25
110.3	111.0	33.66	7.17	26.34
120.3	121.1	33.74	7.12	26.41
130.3	131.1	33.76	7.09	26.43
140.0	140.9	33.81	7.02	26.48
150.0	151.0	33.85	6.94	26.52
160.0	161.1	33.87	6.81	26.56
169.9	171.0	33.89	6.72	26.59
179.8	181.0	33.91	6.64	26.61
189.8	191.1	33.93	6.61	26.63
199.6	200.9	33.93	6.56	26.64
225.4	227.0	33.96	6.25	26.70
250.2	252.0	33.98	5.90	26.76
275.0	276.9	33.94	5.42	26.79
299.8	302.0	33.95	5.30	26.81
324.7	327.1	33.97	5.16	26.84
350.3	353.0	33.98	5.08	26.86
375.2	378.1	34.01	5.01	26.89
400.0	403.0	34.04	4.85	26.94
424.7	428.0	34.07	4.88	26.95
449.6	453.1	34.10	4.88	26.97
475.2	479.0	34.11	4.72	27.00
496.8	500.8	34.13	4.68	27.02

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 50 8.90
DATE 5/ 9/81
TIME (PST) 1041

TAPE: UD0454 -616
LONG W 128 34.00
PASS NO. 9
STN: K.I. 5

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.7	.7	31.61	15.97	23.15
1.8	1.8	31.60	15.98	23.15
5.0	5.0	31.61	15.98	23.15
10.0	10.0	31.60	15.90	23.16
14.9	15.0	31.73	15.07	23.44
19.9	20.0	32.05	12.57	24.20
24.9	25.0	32.37	10.56	24.81
30.0	30.1	32.31	9.93	24.86
34.6	34.8	32.36	9.65	24.95
39.9	40.1	32.40	9.35	25.03
45.2	45.4	32.46	9.01	25.13
49.8	50.1	32.57	8.70	25.27
59.8	60.1	32.65	8.37	25.38
69.6	69.9	32.80	8.10	25.54
79.7	80.1	33.05	7.73	25.79
90.4	90.9	33.22	7.44	25.96
100.4	101.0	33.55	7.34	26.23
110.2	110.9	33.62	7.27	26.30
120.2	120.9	33.70	7.14	26.38
130.3	131.1	33.78	7.03	26.46
140.1	141.0	33.83	6.93	26.51
150.2	151.1	33.87	6.86	26.55
159.9	160.9	33.90	6.74	26.59
169.9	171.0	33.92	6.65	26.62
179.8	181.0	33.92	6.57	26.63
189.8	191.0	33.93	6.42	26.66
199.6	200.9	33.94	6.30	26.68
225.5	227.1	33.95	6.02	26.72
250.3	252.0	33.95	5.81	26.75
275.2	277.1	33.95	5.61	26.78
299.7	301.9	33.98	5.58	26.80
324.6	327.0	34.00	5.39	26.84
350.4	353.0	34.03	5.26	26.88
375.2	378.0	34.04	5.22	26.89
399.9	403.0	34.06	5.09	26.92
424.7	428.0	34.07	4.99	26.94
450.4	453.9	34.08	4.89	26.96
475.2	479.0	34.10	4.78	26.99
488.9	492.8	34.10	4.71	27.00

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 50 5.00
DATE 5/ 9/81
TIME (PST) 1143

TAPE: U00454 -617
LONG W 128 40.80
PASS NO. 11
STN: K.I. 6

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.61	16.03	23.14
2.1	2.1	31.61	16.02	23.14
4.9	5.0	31.61	16.02	23.14
10.0	10.0	31.61	15.99	23.15
15.0	15.1	31.62	15.91	23.17
20.0	20.1	31.68	15.43	23.32
24.9	25.0	31.89	14.20	23.75
29.8	30.0	32.16	12.25	24.34
34.9	35.0	32.28	10.91	24.68
39.8	39.9	32.38	10.18	24.88
44.9	45.1	32.43	9.42	25.04
49.9	50.1	32.52	8.89	25.19
59.7	60.0	32.69	8.47	25.39
69.7	70.0	32.87	8.12	25.58
79.7	80.1	33.02	7.76	25.76
90.4	90.9	33.22	7.34	25.98
100.4	100.9	33.45	7.41	26.14
110.3	110.9	33.57	7.36	26.25
120.3	121.0	33.68	7.05	26.37
130.2	131.0	33.75	6.99	26.44
140.2	141.0	33.82	6.94	26.50
150.1	151.1	33.87	6.85	26.55
160.0	161.0	33.89	6.77	26.58
169.9	170.9	33.89	6.74	26.58
179.9	181.1	33.91	6.65	26.61
189.7	191.0	33.92	6.61	26.62
199.6	200.9	33.92	6.55	26.63
224.6	226.1	33.94	6.31	26.68
250.3	252.1	33.95	5.95	26.73
275.0	277.0	33.95	5.71	26.76
299.8	302.0	33.97	5.52	26.80
324.6	326.9	33.98	5.42	26.82
350.4	353.0	33.99	5.25	26.85
375.2	378.0	34.00	5.07	26.87
400.0	403.0	34.04	5.10	26.90
424.8	428.1	34.05	4.94	26.93
449.6	453.1	34.08	4.77	26.97
475.3	479.0	34.10	4.67	27.00
495.7	499.7	34.11	4.59	27.02

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE TAPE: U00454 -618
LAT N 49 53.70 LONG W 127 30.30
DATE 5/ 9/81 PASS NO. 13
TIME (PST) 1641 STN: K.S. 1

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.4	31.72	15.38	23.36
1.9	1.9	31.72	15.37	23.37
5.0	5.0	31.71	15.31	23.37
10.0	10.0	31.80	14.69	23.58
14.9	14.9	31.90	13.85	23.82
19.8	19.9	31.99	13.16	24.03
24.8	24.9	32.11	12.39	24.28
29.8	30.0	32.52	9.98	25.02
34.9	35.1	32.67	9.38	25.24
39.9	40.1	32.79	8.95	25.40
44.8	45.0	32.93	8.46	25.59
49.8	50.0	33.04	8.10	25.72
59.7	60.0	33.15	7.87	25.84
64.6	64.9	33.22	7.72	25.92

CRUISE NO: 22 CODE TAPE: U00454 -619
LAT N 49 50.00 LONG W 127 36.00
DATE 5/ 9/81 PASS NO. 15
TIME (PST) 1717 STN: K.S. 2

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	31.55	16.03	23.09
2.0	2.1	31.55	16.03	23.09
5.1	5.1	31.56	16.02	23.10
9.9	9.9	31.83	14.78	23.58
14.8	14.9	31.82	14.68	23.59
20.0	20.1	32.04	13.29	24.05
24.9	25.0	32.19	11.87	24.44
29.8	29.9	32.37	11.32	24.68
34.9	35.1	32.70	9.71	25.21
39.8	40.0	32.82	8.97	25.42
44.9	45.1	32.90	8.52	25.55
49.9	50.1	32.94	8.38	25.60
59.7	60.0	33.21	7.76	25.91
69.6	70.0	33.33	7.53	26.03
79.6	80.0	33.52	7.26	26.22
90.4	90.9	33.55	7.22	26.24
93.3	93.8	33.55	7.22	26.25

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 49 46.40
DATE 5/ 9/81
TIME (PST) 1757

TAPE: U00454 -620
LONG W 127 42.10
PASS NO. 17
STN: K.S. 3

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.58	16.18	23.08
2.0	2.0	31.58	16.18	23.08
4.9	4.9	31.58	16.17	23.09
10.0	10.0	31.61	15.66	23.22
15.0	15.1	31.69	15.00	23.42
19.9	19.9	31.79	14.10	23.69
24.9	25.0	32.03	12.09	24.27
29.8	29.9	32.25	10.34	24.75
34.7	34.9	32.44	9.33	25.07
39.9	40.1	32.50	9.03	25.16
44.7	44.9	32.58	8.75	25.26
49.7	50.0	32.61	8.58	25.32
59.6	59.9	32.86	8.21	25.56
69.6	69.9	33.08	7.76	25.81
79.5	80.0	33.21	7.40	25.96
90.4	90.9	33.47	6.88	26.23
100.5	101.1	33.55	6.72	26.32
110.5	111.1	33.60	6.76	26.35
120.2	121.0	33.69	6.86	26.41
130.3	131.1	33.82	6.99	26.49
140.1	141.0	33.87	6.94	26.54
150.0	151.0	33.90	6.84	26.57
160.1	161.1	33.91	6.79	26.59
169.9	171.0	33.93	6.69	26.62
179.7	180.9	33.93	6.63	26.63
189.7	191.0	33.94	6.55	26.65
200.5	201.8	33.95	6.47	26.67
225.5	227.0	33.97	6.29	26.70
250.3	252.1	33.98	6.08	26.74
275.1	277.0	33.99	5.94	26.76
299.9	302.0	34.00	5.83	26.78
324.8	327.2	34.01	5.70	26.81
349.6	352.2	34.02	5.59	26.83
375.2	378.0	34.03	5.54	26.84
399.8	402.9	34.04	5.43	26.86
424.6	427.9	34.05	5.33	26.88
449.6	453.2	34.06	5.22	26.91
475.2	479.0	34.07	5.08	26.93
494.1	498.1	34.08	5.04	26.95

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 49 42.70
DATE 5/ 9/81
TIME (PST) 1845

TAPE: U00454 -621
LONG W 127 48.30
PASS NO. 19
STN: K.S. 4

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	31.59	16.15	23.09
2.1	2.1	31.59	16.16	23.09
4.9	4.9	31.59	16.15	23.10
10.0	10.1	31.62	15.76	23.21
14.9	15.0	31.65	15.41	23.30
19.9	20.0	31.89	14.06	23.77
24.9	25.0	32.25	11.56	24.53
30.0	30.1	32.24	10.56	24.70
34.9	35.1	32.32	9.86	24.88
39.8	39.9	32.35	9.65	24.94
44.8	45.0	32.39	9.37	25.02
49.8	50.0	32.46	9.07	25.12
59.6	59.9	32.68	8.57	25.37
69.7	70.0	32.87	8.20	25.58
80.5	80.9	33.06	7.89	25.77
90.5	91.0	33.18	7.35	25.94
100.5	101.0	33.35	6.83	26.15
110.3	110.9	33.48	6.59	26.28
120.3	121.0	33.57	6.47	26.37
130.1	130.9	33.67	6.42	26.45
140.2	141.1	33.73	6.49	26.48
150.1	151.0	33.80	6.52	26.54
160.1	161.1	33.84	6.61	26.56
170.0	171.1	33.90	6.74	26.59
179.9	181.1	33.92	6.70	26.61
189.7	191.0	33.93	6.62	26.63
199.7	201.1	33.93	6.55	26.64
225.4	227.0	33.94	6.29	26.68
250.4	252.1	33.96	6.08	26.72
275.0	277.0	33.96	5.84	26.76
299.9	302.0	33.98	5.56	26.80
324.7	327.0	33.98	5.43	26.82
350.5	353.1	33.99	5.30	26.84
375.2	378.0	34.01	5.18	26.87
400.0	403.1	34.04	5.09	26.90
424.6	427.9	34.06	5.04	26.93
449.6	453.2	34.09	4.97	26.96
475.3	479.0	34.09	4.91	26.97
495.1	499.0	34.11	4.85	26.98

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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22   CODE                               TAPE: U00454   -622
LAT  N 49 38.90                                    LONG W 127 54.80
DATE  5/ 9/81                                      PASS NO. 21
TIME (PST) 1940                                    STN: K.S. 5

 DEPTH      PRESS        SAL        TEMP     SIGMA-T
    .7         .7      31.59       16.07      23.11
   2.0        2.0      31.59       16.07      23.11
   5.0        5.0      31.59       16.07      23.11
   9.9       10.0      31.62       15.84      23.19
  15.0       15.0      31.68       15.45      23.32
  19.9       20.0      31.82       15.02      23.52
  24.9       25.0      32.01       13.93      23.89
  29.8       30.0      32.14       12.65      24.25
  34.8       34.9      32.28       11.12      24.64
  39.8       40.0      32.32       10.28      24.82
  44.8       45.0      32.34        9.94      24.89
  49.7       49.9      32.39        9.45      25.01
  59.7       60.0      32.48        8.93      25.16
  69.7       70.0      32.57        8.59      25.28
  79.7       80.1      32.76        8.26      25.48
  89.5       90.0      32.98        8.04      25.68
 100.4      101.0      33.21        7.73      25.91
 110.4      111.0      33.34        6.96      26.12
 120.4      121.1      33.52        6.54      26.32
 130.2      131.0      33.60        6.45      26.39
 140.1      140.9      33.66        6.39      26.45
 150.1      151.0      33.70        6.35      26.49
 159.9      160.9      33.75        6.29      26.53
 170.0      171.1      33.80        6.23      26.57
 180.0      181.2      33.85        6.39      26.60
 189.7      191.0      33.89        6.39      26.63
 199.6      200.9      33.91        6.34      26.65
 225.4      226.9      33.94        6.13      26.70
 250.2      251.9      33.95        6.01      26.73
 275.0      277.0      33.97        5.81      26.76
 299.9      302.0      33.98        5.65      26.79
 324.7      327.1      33.98        5.48      26.81
 350.5      353.1      34.01        5.23      26.86
 375.3      378.2      34.01        5.10      26.88
 400.0      403.0      34.03        4.98      26.91
 424.8      428.1      34.04        4.89      26.93
 450.5      454.0      34.05        4.66      26.96
 475.2      479.0      34.06        4.47      26.99
 493.2      497.1      34.07        4.38      27.01
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO:  22    CODE                              TAPE: U00454    -623
LAT  N 49 35.00                                     LONG W 128   1.10
DATE  5/ 9/81                                       PASS NO. 23
TIME (PST) 2035                                     STN: K.S. 6

  DEPTH      PRESS        SAL        TEMP     SIGMA-T
     .3         .3      31.68       16.43      23.10
    2.0        2.0      31.68       16.43      23.10
    5.0        5.0      31.68       16.43      23.10
   10.0       10.0      31.69       16.39      23.12
   15.0       15.1      31.77       16.12      23.24
   20.0       20.1      31.78       16.10      23.25
   24.9       25.0      31.99       15.78      23.49
   29.9       30.0      32.12       15.28      23.69
   34.9       35.1      32.14       13.46      24.09
   39.8       40.0      32.32       11.51      24.60
   44.7       44.9      32.41       10.05      24.92
   49.8       50.1      32.43        9.62      25.01
   59.9       60.2      32.49        8.90      25.17
   69.6       70.0      32.55        8.51      25.28
   79.6       80.0      32.63        8.39      25.36
   89.6       90.0      32.78        8.13      25.52
  100.4      100.9      32.98        7.57      25.75
  110.4      111.1      33.20        7.11      25.99
  120.3      121.0      33.33        6.87      26.12
  130.3      131.0      33.51        6.56      26.31
  140.1      141.0      33.57        6.45      26.37
  150.3      151.2      33.66        6.31      26.46
  160.0      160.9      33.72        6.30      26.50
  170.0      171.0      33.74        6.25      26.53
  179.9      181.0      33.78        6.26      26.56
  189.8      191.0      33.80        6.22      26.58
  199.7      201.0      33.83        6.16      26.61
  224.6      226.1      33.86        5.90      26.67
  250.3      252.0      33.92        5.85      26.72
  275.0      276.9      33.96        5.81      26.75
  299.9      302.0      33.98        5.64      26.79
  324.5      326.8      33.99        5.47      26.82
  349.6      352.1      34.00        5.34      26.84
  375.1      377.9      34.01        5.15      26.88
  400.1      403.1      34.04        5.02      26.91
  424.7      427.9      34.05        4.89      26.94
  450.5      454.0      34.07        4.77      26.97
  475.2      478.9      34.09        4.65      26.99
  487.0      490.8      34.10        4.61      27.01
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COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE TAPE: U00454 -624
LAT N 48 39.00 LONG W 125 2.50
DATE 6/ 9/81 PASS NO. 27
TIME (PST) 1516 STN: 101

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.6	.6	31.71	11.40	24.15	
1.9	2.0	31.71	11.39	24.15	
5.1	5.2	31.71	11.35	24.16	
10.0	10.1	31.79	10.33	24.39	4.42
14.9	15.0	31.91	9.86	24.57	
20.0	20.1	32.04	9.85	24.67	
24.9	25.0	32.09	9.61	24.75	3.69
29.8	29.9	32.15	9.51	24.81	
34.9	35.0	32.21	9.35	24.88	
39.8	40.0	32.30	9.13	24.99	
44.7	45.0	32.41	8.94	25.10	3.37
44.7	45.0	32.41	8.94	25.10	

CRUISE NO: 22 CODE TAPE: U00454 -625
LAT N 48 35.60 LONG W 125 9.00
DATE 6/ 9/81 PASS NO. 29
TIME (PST) 1607 STN: 102

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.1	.1	31.81	11.09	24.28
2.0	2.0	31.80	11.11	24.27
4.9	4.9	31.81	11.10	24.27
10.0	10.1	31.86	10.84	24.36
14.9	15.0	31.91	10.42	24.47
19.8	19.9	31.99	10.00	24.60
24.9	25.0	32.00	9.87	24.63
29.9	30.0	32.07	9.61	24.73
34.8	35.0	32.12	9.42	24.80
39.9	40.1	32.42	8.93	25.11
44.9	45.1	32.63	8.68	25.32
49.8	50.1	32.84	8.38	25.52
59.6	59.9	32.95	8.20	25.63
69.5	69.9	33.04	8.18	25.71
80.5	80.9	33.43	7.57	26.10
89.5	90.0	33.68	7.10	26.36
100.4	101.0	33.69	7.08	26.38
106.3	107.0	33.70	7.04	26.39

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE TAPE: U00454 -626
LAT N 48 32.20 LONG W 125 15.50
DATE 6/ 9/81 PASS NO. 31
TIME (PST) 1648 STN: 103

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	32.08	13.05	24.13	
2.1	2.1	32.09	13.06	24.13	
5.1	5.1	32.09	13.05	24.13	
9.9	10.0	32.07	11.79	24.35	5.26
14.9	15.0	32.11	10.57	24.60	
19.9	20.0	32.31	9.94	24.86	
24.9	25.0	32.44	9.46	25.04	4.02
29.9	30.0	32.54	9.33	25.14	
34.9	35.0	32.75	8.95	25.37	
39.9	40.1	33.00	8.49	25.64	
44.8	45.1	33.06	8.34	25.70	
49.7	50.0	33.20	7.94	25.87	3.14
59.6	60.0	33.46	7.46	26.14	
69.5	70.0	33.63	7.22	26.31	
74.5	75.0	33.67	7.16	26.35	2.55
80.5	81.0	33.75	6.92	26.45	
90.4	91.0	33.79	6.86	26.48	
100.5	101.1	33.80	6.82	26.50	2.14
110.2	110.9	33.82	6.75	26.53	
112.4	113.1	33.82	6.74	26.53	

CRUISE NO: 22 CODE TAPE: U00454 -627
LAT N 48 28.90 LONG W 125 21.80
DATE 6/ 9/81 PASS NO. 33
TIME (PST) 1735 STN: 104

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	32.17	13.17	24.17
2.0	2.0	32.17	13.16	24.17
4.9	5.0	32.17	13.13	24.18
10.0	10.0	32.24	11.77	24.49
14.9	15.0	32.27	11.49	24.57
19.9	20.0	32.47	10.52	24.89
24.9	25.1	32.60	9.77	25.12
29.9	30.0	32.73	9.20	25.31
34.7	34.9	32.84	8.76	25.47
39.8	40.1	33.05	8.10	25.73
44.8	45.1	33.21	7.82	25.90
49.8	50.1	33.28	7.70	25.97
59.7	60.1	33.49	7.32	26.18
69.6	70.0	33.63	7.01	26.34
80.4	80.9	33.77	6.81	26.47
90.4	91.0	33.83	6.69	26.54
100.4	101.0	33.85	6.54	26.57
110.3	111.0	33.86	6.50	26.59
120.2	121.0	33.88	6.50	26.60
130.2	131.1	33.88	6.49	26.61
139.9	140.8	33.88	6.48	26.61

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22   CODE
LAT N 48 25.50
DATE 6/ 9/81
TIME (PST) 1828

TAPE: U00454   -628
LONG W 125 28.30
PASS NO. 35
STN: 105

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.4	.4	32.07	13.75	23.98	
2.1	2.1	32.07	13.75	23.98	
5.0	5.0	32.07	13.74	23.98	
10.0	10.0	32.22	12.21	24.40	6.40
15.0	15.1	32.29	11.76	24.53	
19.8	19.9	32.41	11.09	24.74	
24.9	25.0	32.47	10.73	24.86	4.38
30.0	30.1	32.61	9.94	25.10	
34.7	34.9	32.89	9.04	25.46	
39.7	39.9	33.09	8.39	25.72	
44.7	45.0	33.28	7.94	25.94	
49.7	50.0	33.37	7.72	26.03	2.95
59.7	60.0	33.50	7.42	26.18	
69.5	70.0	33.64	7.09	26.34	
75.5	76.0	33.67	7.00	26.37	2.34
79.5	80.0	33.68	6.98	26.38	
90.3	90.9	33.73	6.80	26.45	
100.3	100.9	33.76	6.76	26.47	2.00
110.3	111.0	33.77	6.74	26.48	
120.2	121.0	33.80	6.66	26.53	
125.2	126.0	33.83	6.62	26.55	1.71
126.1	126.9	33.82	6.63	26.54	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22   CODE   TAPE: U00454   -629
LAT N 48 22.00   LONG W 125 34.70
DATE 6/ 9/81   PASS NO. 37
TIME (PST) 1919   STN: 106

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.3	.3	32.01	13.35	24.01
2.0	2.0	32.00	13.36	24.00
5.0	5.0	32.16	12.96	24.21
9.8	9.9	32.18	11.67	24.47
15.0	15.1	32.20	11.37	24.53
19.9	20.0	32.31	10.94	24.69
24.8	25.0	32.50	10.02	25.00
29.8	29.9	32.69	9.30	25.27
34.9	35.1	32.83	8.88	25.44
39.8	40.0	33.02	8.32	25.67
44.7	45.0	33.14	8.10	25.80
49.7	49.9	33.25	7.92	25.91
59.6	60.0	33.41	7.49	26.10
69.7	70.1	33.48	7.43	26.17
79.6	80.1	33.55	7.24	26.25
90.4	91.0	33.62	7.03	26.33
100.4	101.0	33.71	6.80	26.44
110.2	110.9	33.77	6.72	26.49
120.2	121.0	33.85	6.62	26.56
130.2	131.0	33.90	6.59	26.61
140.1	141.0	33.92	6.60	26.63
141.9	142.8	33.92	6.58	26.63

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22   CODE   TAPE: U00454   -630
LAT N 48 18.60   LONG W 125 41.20
DATE 6/ 9/81   PASS NO. 39
TIME (PST) 2008   STN: 107

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.3	.3	31.95	13.74	23.89	
1.9	1.9	31.95	13.76	23.88	
5.0	5.0	32.13	12.29	24.31	
10.0	10.0	32.14	10.81	24.59	6.26
15.0	15.1	32.15	10.62	24.62	
19.9	20.0	32.27	9.96	24.83	
24.9	25.0	32.27	9.79	24.86	4.15
29.9	30.0	32.48	9.13	25.12	
34.8	35.0	32.50	9.10	25.14	
39.7	39.9	32.51	9.03	25.17	
44.7	45.0	32.68	8.71	25.35	
49.7	50.0	32.79	8.41	25.48	4.31
59.7	60.0	32.97	8.09	25.67	
69.6	70.0	33.18	7.88	25.86	
74.5	74.9	33.32	7.81	25.99	4.10
80.4	80.9	33.48	7.62	26.14	
90.4	90.9	33.60	7.44	26.26	
100.4	101.0	33.70	7.34	26.35	3.58
110.2	110.9	33.76	7.28	26.41	
120.2	120.9	33.84	7.17	26.48	
125.3	126.1	33.88	7.08	26.53	2.92
130.1	131.0	33.89	6.92	26.56	
140.1	141.0	33.92	6.70	26.61	2.52
142.1	143.0	33.92	6.66	26.62	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 48 15.10
DATE 6/ 9/81
TIME (PST) 2111

TAPE: U00454 -631
LONG W 125 47.70
PASS NO. 41
STN: 108

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.2	.2	32.12	15.52	23.65
2.0	2.1	32.13	15.51	23.65
5.0	5.0	32.13	15.51	23.65
10.0	10.0	32.25	13.33	24.20
15.0	15.1	32.27	12.65	24.35
19.9	20.0	32.39	10.89	24.77
25.0	25.2	32.41	10.34	24.88
29.9	30.0	32.43	9.84	24.97
34.8	34.9	32.42	9.73	24.98
39.8	40.0	32.45	9.41	25.06
44.8	45.0	32.46	9.19	25.10
49.7	50.0	32.50	8.92	25.18
59.6	60.0	32.72	8.51	25.41
69.5	69.9	33.01	8.08	25.70
79.5	80.0	33.38	7.51	26.08
90.5	91.0	33.54	7.46	26.21
100.5	101.1	33.71	7.34	26.36
110.3	111.0	33.81	7.24	26.45
120.3	121.0	33.83	7.10	26.48
130.3	131.1	33.84	7.09	26.49
140.2	141.1	33.87	6.99	26.53
150.0	150.9	33.90	6.91	26.57
160.0	161.1	33.93	6.84	26.60
169.9	171.0	33.95	6.73	26.63
179.9	181.1	33.95	6.68	26.64
189.7	191.0	33.97	6.60	26.66
199.7	201.0	33.99	6.41	26.70
201.3	202.6	33.99	6.40	26.71

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 48 12.90
DATE 6/ 9/81
TIME (PST) 2153

TAPE: U00454 -632
LONG W 125 52.00
PASS NO. 43
STN: 109

DEPTH	PRESS	SAL	TEMP	SIGMA-T	OXYGEN
.2	.2	32.04	15.73	23.54	
2.0	2.0	32.09	15.74	23.57	
4.9	5.0	32.10	15.72	23.59	
10.0	10.1	32.25	13.65	24.14	
14.8	14.9	32.32	12.11	24.49	
19.9	20.0	32.41	10.79	24.80	
24.9	25.0	32.42	10.21	24.91	5.88
29.9	30.0	32.45	9.63	25.03	
34.9	35.0	32.44	9.38	25.06	
39.8	40.0	32.45	9.26	25.09	
44.8	45.1	32.54	8.86	25.22	
49.8	50.0	32.62	8.60	25.32	5.94
59.7	60.0	32.79	8.36	25.49	
69.6	70.0	33.06	7.85	25.77	
74.7	75.1	33.08	7.75	25.81	5.02
79.6	80.0	33.17	7.64	25.89	
90.4	91.0	33.39	7.28	26.12	
100.5	101.1	33.48	7.08	26.21	4.69
110.3	111.0	33.61	6.80	26.35	
120.3	121.1	33.70	6.85	26.42	
125.2	126.0	33.75	6.98	26.44	3.64
130.1	130.9	33.78	7.06	26.45	
140.2	141.1	33.83	6.99	26.50	
150.1	151.0	33.86	7.01	26.53	3.44
159.9	161.0	33.90	6.93	26.57	
169.9	171.0	33.93	6.89	26.59	
179.8	181.0	33.94	6.82	26.61	
189.7	191.0	33.95	6.71	26.63	
199.6	200.9	33.97	6.66	26.65	2.41
225.3	226.9	33.98	6.47	26.69	
250.3	252.0	33.99	6.27	26.72	2.09
275.0	277.0	33.97	5.92	26.75	
299.9	302.1	33.99	5.74	26.79	1.79
324.6	327.0	34.01	5.75	26.80	
350.5	353.1	34.00	5.45	26.84	
375.2	378.1	34.02	5.25	26.87	
399.9	403.0	34.04	5.15	26.90	
424.7	428.0	34.05	5.15	26.91	
450.5	454.0	34.09	5.17	26.93	
475.2	479.0	34.09	5.07	26.95	
495.1	499.1	34.11	4.98	26.97	

COASTAL ZONE OCEANOGRAPHY
CRUISE NO: 22 CODE
LAT N 48 10.60
DATE 6/ 9/81
TIME (PST) 2304

TAPE: U00454 -633
LONG W 125 56.20
PASS NO. 45
STN: 110

DEPTH	PRESS	SAL	TEMP	SIGMA-T
.6	.6	32.13	15.74	23.60
2.1	2.1	32.12	15.73	23.60
5.1	5.1	32.13	15.73	23.60
10.0	10.0	32.13	15.70	23.61
14.9	15.0	32.16	14.96	23.79
20.0	20.1	32.29	12.32	24.43
24.9	25.0	32.33	11.31	24.64
29.8	29.9	32.45	10.26	24.92
34.8	35.0	32.44	9.66	25.01
39.9	40.1	32.47	9.33	25.09
44.8	45.1	32.48	9.06	25.14
49.8	50.1	32.53	8.85	25.21
59.8	60.1	32.70	8.47	25.40
69.5	69.9	32.92	8.11	25.63
79.5	80.0	33.15	7.79	25.85
90.4	90.9	33.28	7.63	25.98
99.6	100.2	33.44	7.25	26.16
110.3	111.0	33.55	7.16	26.26
120.3	121.0	33.64	7.12	26.33
130.2	131.0	33.69	6.96	26.39
140.2	141.0	33.77	6.89	26.47
149.9	150.9	33.81	6.78	26.52
160.0	161.1	33.86	6.86	26.54
169.9	171.0	33.90	6.89	26.57
179.9	181.0	33.93	6.85	26.60
189.7	190.9	33.93	6.75	26.61
199.7	201.0	33.94	6.59	26.64
225.4	226.9	33.95	6.43	26.67
250.1	251.9	33.97	6.29	26.70
275.0	277.0	33.97	6.03	26.74
299.8	301.9	33.97	5.85	26.76
325.5	327.9	33.98	5.61	26.80
350.4	353.0	34.01	5.47	26.83
375.1	378.0	34.03	5.38	26.87
400.1	403.1	34.04	5.22	26.89
424.7	428.0	34.03	4.95	26.91
450.5	454.0	34.06	4.92	26.94
475.2	478.9	34.08	4.83	26.97
499.0	503.0	34.09	4.76	26.98